#### **ANNUAL REPORT: 2007-08**

#### KVK, Bongaigaon

#### Guidelines for filling up the Proforma:

- 1. This Proforma can also be downloaded from the website www.icarzcu3.gov.in Don't type the Proforma again.
- 2. Don't change the page setup of this Proforma under any circumstances. Use the same proforma provided.
- 3. The Proforma has to be filled up strictly in Arial font 8 point size in single spacing. Don't use bold and italics anywhere in the text.
- 4. The Proforma given below has to be filled up in full and no column should be left vacant.
- 5. If any column appears not applicable to your KVK then it may be filled as 'NA'. Don't use any other abbreviations in such cases.
- 6. Enter data strictly confirming to the units specified in the Proforma. (Ex: ha, kg, qtl etc) Don't enter data in units such as acres or bighas.
- 7. Provide atleast 10 action photographs (JPEG images only) showing OFT, FLD and Training activities as a separate folder with annual report in same CD.

# PART – I (GENERAL INFORMATION)

#### 1. General information about the KVK

Name and address of KVK with Phone, Fax and E-mail\*

Complete postal address with Pin Code	Telephone	Fax	E mail
Krishi Vigyan Kendra, Bongaigaon. P.O.: Kajalgaon, Dist.: Chirang, PIN-783385	(03664) 243775		

Name and address of host organization with Phone, Fax and E-mail\*

Complete postal address with Pin Code	Telephone	Fax	E mail
Assam Agricultural University, Jorhat-785013 Assam	(0376) 2340001		

Name of the Programme Coordinator with Landline & Mobile No\*

Name of PC	Contacts			
Name of FC	Residence	Mobile	E mail	
Dr. S. K. Paul Krishi Vigyan Kendra, Bongaigaon. P.O.: Kajalgaon, Dist.: Chirang, PIN-783385		9435120552	-	

<sup>\* =</sup> Mandatory and to be provided without fail.

Year of sanction of KVK: 2004 Staff Position\* (As on 30<sup>th</sup> August, 2008)

No.	Sanctioned posts	Name of the incumbent	Designation	Disciplin e	Date of joining	Permanent /Temporary
1	Programme Coordinator	Dr. S. K. Paul	Programme Coordinator	PBG	22.09.04	Permanent
2	Subject Matter Specialist	Dr. K. K. Deka	Subject Matter Specialist	HORT	22.09.04	Permanent
3	Subject Matter Specialist	Dr. C. K. Sarma	Subject Matter Specialist	AGRON	29.12.05	Permanent
4	Subject Matter Specialist	-	-	-	ı	-
5	Subject Matter Specialist	-	-	-	-	-
6	Subject Matter Specialist	-	-	-	-	-
7	Subject Matter Specialist	-	-	-	-	-
8	Programme Assistant	-	-	-	-	-
9	Computer Programmer	-	-	-	1	-
10	Farm Manager	-	-	-	ı	-
11	Accountant / Superintendent	Mr. D. D. Mahanta	Accountant / Superintendent	1	14.08.06	Permanent
12	Stenographer	Mr. Madhusudan Ghosh	Typist	1	22.02.06	Permanent
13	Driver	-	-	-	1	-
14	Driver	-	-	-	-	-
15	Supporting staff	Mr. Pulen Ch. Roy	Grade- IV	-	21.2.06	Permanent
16	Supporting staff	Mr. Levi Murmu	Grade- IV	-	21.2.06	Permanent

<sup>\* =</sup> The staff position should reflect in the quantity and quality of all programmes conducted by KVK in the annual report

Total land with KVK (in ha): 12.0 ha

No.	Item	Area (ha)
1	Under Buildings	Under construction
2.	Under Demonstration Units	NA
3.	Under Crops	NA
4.	Orchard/Agro-forestry	NA
5.	Others	NA

## Infrastructural Development:

# A) Buildings

		Source	Stage						
No.	Name of Building	of		Complete			Incomplete		
NO.	Name of Building	Funding	Completion	Plinth area	Expenditure	Starting	Plinth area	Status of	
		ranang	Date	(Sq. m)	(Rs.)	Date	(Sq. m)	Construction	
1	Administrative Building	ICAR				05.06.2008	400		
2	Farmers Hostel					Not yet	200	NA	
						started			
3	Staff Quarters (6)					Not yet	100	NA	
						started			
4	Demonstration Units (2)					Not yet	20	NA	
						started			
5	Fencing								
6	Rain Water harvesting system								
7	Threshing floor								
8	Farm Go-down								

## B) Vehicles

Type of vehicle	Year of purchase	Cost (Rs.)	Total kms. Run	Present status
Jeep	2005-06	4.9	10,317	Good
Tractor	2006-07	3.66	136 hrs	Good

# C) Equipments & AV aids

Name of the equipment	Year of purchase	Cost (Rs.)	Present status
Copier Machine	2006-07	0.54	Good
Digital Camera	2007-08	0.20	Good
Fax Machine	2007-08	0.09	Good

Details SAC meeting\* conducted in the year: Not conducted during 2007-08

No.	Date	Number of Participants	Salient Recommendations	Action taken
1.				
2.				

<sup>\*</sup> Attach a copy of SAC proceedings along with list of participants

2. Details of district (2007-08)
Major farming systems existing in the district\* (based on the study made by the KVK)

No	Farming systems identified
1.	Agriculture (crops) – Horticulture (Fruits & vegetables)
2.	Agriculture (crops) – Animal Husbandry (Dairy, Poultry, Piggery, Goatery, Duckery etc.)
3.	Agriculture – Animal Husbandry - Horticulture
4.	Agriculture – Horticulture - Fisheries
5.	Agriculture – Fisheries

<sup>\* =</sup> the programmes conducted by KVK should be matching with the identified farming systems

## Description of Agro-climatic Zone (based on soil and topography)

No	Agro-climatic Zone	Characteristics
1.	Lower Brahmaputra Valley Zone	The soil of the zone is mostly acidic in nature and soil $P^H$ gradually increases towards the river Brahmaputra. The soil is medium to high in organic carbon and available N, low in available $P_2O_5$ and medium in $K_2O$ status.
		Four orders of soils are found in the zone (i) Entisol, (ii) Inceptisol, (iii) Alfisol and (iv) Ultisol.

## Description of major agro ecological situations (based on soil and topography)

No	Agro ecological situation	Characteristics
1.	Foot hill old mountain valley alluvial plain	The northern part of the district comprising this situation contains old mountain valley alluvial soils (Alfisol & Ultisol). It is build up of alluvial materials washed down from the hill slops. The surface soil is light yellow to pale brown, compact, sticky and plastic. Generally, medium to heavy in soil texture. The elevation is higher towards foot hills which gradually slop towards south.
2.	Flood prone recent riverine alluvial plain	Recent riverine alluvial (Entisol), sandy to sandy loam in soil texture. This situation is represented by an almost flat topography which often experiences flood hazard. Apart from some natural depressions, some riverine islands are also in existence.
3.	Flood free riverine alluvial middle plain	Old riverine alluvial type (Inceptisol). The texture of the surface soils ranges from sandy loam to loam, silty clay loam, silty clay and clay. The topography is almost plain.
4.	Char land	New alluvial plains, neutral in reaction, sandy-silty-clayee, sandy-silty and sandy in soil texture (Entisol). Chronically flood affected areas except the stable chars.
5.	Hill and Hillock	Old alluvial type (Alfisol), sandy to sandy loam in texture and acidic in nature. The topography is undulating.
6.	Beels	Entisols, usually peaty in nature and texturally these are silty and clay. Low lying waste land areas

## Soil type/s

The soils of the district are mostly red, alluvial and mixed red. The soil texture is sandy loam to clay loam

No	Soil type	Characteristics	Area in ha
1.	Light gray	Sandy loam to silly loam in texture	114490.07
2.	Red soil (Mixed)	High in 'Fe' and 'Al' oxides. Fairly well drained soil	48349.33
3.	Sandy soil	Light textured soil	27136.60
4.	Sandy loam	Medium textured	106373.41
5.	Clay loam	Heavy textured. Poor external as well as internal drainage	29329.99

# Area, Production and Productivity of major crops cultivated in the district (Enter data strictly in ha, qtl and qtl/ha respectively)

No	Crop	Area (ha)*	Production (qtl)*	Productivity (qtl /ha)*
1.	Rice (Sali)	60754	709610	11.60
2.	Rice (Ahu)	34112	322700	9.46
3.	Rice (Boro)	9983	190970	19.13
4.	Rapeseed & Mustard	13182	66040	5.01
5.	Sesamum	572	2590	4.52
6.	Black gram	2667	12030	4.51
7.	Lentil	2417	13340	5.52
8.	Wheat	5942	74280	12.50
9.	Jute	2994	273620	16.45
10.	Potato	3418	220600	64.54
11.	Chilly	877	5590	6.37
12.	Kharif vegetables	2757	320640	116.30
13.	Rabi vegetables	6614	1084700	164.00
14.	Areca nut	3394	55520	16.36
15.	Coconut	730	50310	68.91
16.	Banana	992	120141	121.11
17.	Assam lemon	465	16810	36.15
18.	Ginger	544	33310	61.23

<sup>\* =</sup> no change of unit is allowed

## Weather data

Month	Rainfall (mm)	Tem	perature <sup>0</sup> C	Relative Humidity (%)
WOITH	naiiliali (IIIIII)	Maximum	Minimum	
September 2007	659.9			
October	168.0			
November	1.3			
December	0.0			
January 2008	51.7			
February	36.0			
March	160.6			
April	376.9			
May	345.9			
June	616.9			
July	511.0			
August	1066.7			

# Production and productivity of livestock, Poultry, Fisheries etc. in the district

Category	Population	Production	Productivity
Cattle	-	·	<u> </u>
Crossbred	8,876	10404kg ( meat) 6101046lit (milk)	687.36 lit/Animal
Indigenous	1,62,492	128448kg ( meat) 18239247 (milk)	112.24 lit/Animal
Buffalo	3,948	18957 kg (meat) 3658769 (milk)	926.73 lit/Animal
Crossbred			
Indigenous	36,814	17682 kg( meat)	
Goats	1,27,300	221743 kg( meat) 1096894(milk)	8.6 lit/Animal
Pigs			
Crossbred	11,375	-	
Indigenous	22,755	-	
Rabbits			
Hens			
Desi			
Improved			
Ducks	4,64,458	54,439 kg( meat) 63,76,833 eggs	
Turkey and others			
Fish	10,865.91ha	5,794.31 MT	2150kg/ha (Pond)
Marine			
Inland			
Prawn			
Scampi			
Shrimp			

## Details of Operational area / Villages (2007-08)

No	Taluk	Name of the block	Name of the village	Major crops & enterprises	Major problem identified	Identified Thrust Areas
1.	Bongaigaon	Dungtol	Katuripara	Major crops are rice, black gram, sesame, rapeseed & mustard, lentil, areca nut, coconut, banana, pineapple, citrus, ginger, vegetables, bamboo etc.  Major enterprises are cropping, fruits and vegetables production, dairy etc.	-Soil acidity -Yield gap in paddy, pulses, oilseeds, fruits etcPoor fertility management -Rainfed farming -Inadequate post harvest handling of fruits & vegetables -Un-organized marketing system -Low rate of seed replacement	-Management of acid soil -Crop planning for rainfed areaCommercial production of fruitsIncreasing productivity of major field cropsPreservation of locally available fruits & vegetablesAppropriate nutrient management technique.

No	Taluk	Name of the block	Name of the village	Major crops & enterprises	Major problem identified	Identified Thrust Areas
2.	Sidli	Dangtol	Nowagaon	Rice, rapeseed & mustard, kharif & rabi vegetables, fruits, bamboo etc. are important crops.  Major enterprises included cropping, dairy, piggery etc.	-Soil acidity -Low yield in paddy, oilseeds, vegetables etcPoor nutrient managementUn-organized marketLack of irrigation facility.	-Soil acidity management -Reducing yield gap in major field crops such as rice, oilseeds, pulses etcAdoption of appropriate nutrient management techniquesCrop planning for rainfed areas.
3.	Bijni	Manikpur	Matiapara	Rice, black gram, lentil, rapeseed & mustard, vegetables, pea etc.  Cropping, poultry, fishery etc. are the major enterprises.	-Soil acidity -Yield gap in paddy, pulses oilseeds etcUn-organized marketing systemLow production of fish per unit of water bodies.	-Resource management in acid soilHigher productivity of major field cropsScientific fish farmingAppropriate nutrient management through integrated nutrient management and balance fertilization.
4.	Boitamari	Boitamari	Dolonibeel	Rice(boro), vegetables, rapeseed & mustard, jute etc.  Important enterprises are cropping, fishery & poultry.	-Imbalance use of fertilizer -Excessive use of pesticides -Flood -Yield gap in rice production -Low fish production per unit of water bodies.	-Reduction of yield gap in rice(boro) -Scientific fish productionAdoption of integrated pest management technique in riceContingency crop planning for flood affected areas.

# Priority thrust areas (prioritized in sync with thrust areas identified and given above)

Rank	Thrust area
1.	Resource management in acid in soil.
2.	Higher production of major field crops such as rice, oilseeds & pulses.
3.	Crop planning.
4.	Restoration of soil fertility through integrated nutrient management and balance fertilization.
5.	Commercial production of fruits and vegetables.
6.	Composite fish farming.
7	Integrated pest management

# PART – II (OFT AND FLD)

# 3. Technical achievements

#### Abstract of interventions undertaken

		Owen/					Interventions (if any)		
No	Thrust area	Crop/ Enterprise	Identified Problem	Title of OFT	Title of FLD	Title of Training	Title of training for extension personnel	Extension activities	Supply of seeds, planting materials
1.	Resource management in acid soil.	Black gram	Poor response to applied nutrients due to soil acidity	Response of black gram (var.Pant U 19) to liming and fertilization	-	-	i) Acid soil management ii) Soil quality management	i) Farmer's field visit Advisory services	Seed, lime & fertilizer
2.	Higher production of major field crops	Rice	Yield gap due to lack of suitable varieties & poor adoption of appropriate crop management practices	Performance of scented rice varieties in the farmers field	-	i) Integrated Weed Management in ahu rice ii) Modern techniques of raising Sali rice iii) Modern techniques of raising Sali rice	-	i) Farmer's field visit ii) Advisory services iii) Popular article on "Use of quality seed in agriculture" iv) Delivered talk on "SRI" v) Delivered talk on "Seed production"	Seed, fertilizer & chemicals.
		Rice(Boro)	Yield gap due to lack of knowledge on irrigation management	-	Irrigation manageme nt in rice (Var. Joymati,BR -8)	i) Modern technique of raising boro rice	-	i) Farmer's field visit ii) Field day iii) Advisory services	Seed, fertilizer, chemicals and POL for application of irrigation water
		Black- gram	Low yield due to poor adoption of HYVs and crop management practices.	-	Performanc e of kharif black gram (Var. P U- 19) with recommend ed package of practices.	-	-	i) Farmer's field visit ii) Advisory services	Seed, fertilizer & chemicals.

		Ouen/					Interventions (if any)		
No	Thrust area	Crop/ Enterprise	Identified Problem	Title of OFT	Title of FLD	Title of Training	Title of training for extension personnel	Extension activities	Supply of seeds, planting materials
		Sesame	Low yield due to poor adoption of HYVs and improved crop management practices	-	Performanc e of kharif sesame( Var. AST-1) with recommend ed package of practices.	-	•	i) Farmer's field visit ii) Field day iii) Advisory services	Seed, fertilizer & chemical.
		Toria	Low yield due to poor adoption of HYVs and improved crop management practices; Low yield due to late sowing	Performance of late sown toria grown after Sali paddy	Performanc e of toria (var.TS-36) with recommend ed package of practices.	-	-	i) Farmer's field visit ii) Advisory services	Seed, fertilizer chemical.
		Toria	Yield gap due to lack of knowledge on irrigation management	-	Irrigation manageme nt in toria (Var. TS- 36)	i)Water management practices in major rabi field crops	-	i) Farmer's field visit ii) Field day iii) Advisory services	Seed, fertilizer, chemicals and POL for application of irrigation water
		Lentil	Non availability of suitable variety		Performanc e of lentil variety B-77	-	-	i) Farmer's field visit ii) Advisory services	Seed.
		All crops	Yield gap due to poor adoption improved crop management	-	-	i) Production technology of major rabi field crops	<del>-</del>	i) Farmer's field visit ii) Advisory services iii) Publication of popular article on "Risk management in agriculture"	-

		Crop/					Interventions (if any)		
No	Thrust area	Enterprise	Identified Problem	Title of OFT	Title of FLD	Title of Training	Title of training for extension personnel	Extension activities	Supply of seeds, planting materials
3.	Crop planning	Field crops & horticultural crops.	Poor utilization of resources in terms of time & space direction	-	-	i) Multiple cropping system iii) Multistoried cropping system	-	i) Farmer's field visit ii) Advisory services iii) Publication of popular article on " Diversification in agriculture"	-
		Field crops & horticultural crops.	Crop failure due to flood & drought	-	-	i) Contingency crop planning for flood affected areas	i) Contingency crop planning for flood affected areas	i) Farmer's field visit ii) Advisory services	-
4.	Restoration of soil fertility through integrated nutrient management and balance fertilization	All crops	Nutrient management through alternate sources of plant nutrients to maintain soil health	-	-	i) Use of Bio- fertilizer in crop production.  ii)Green manuring practices iii) Preparation of various organic manure and their application in crop field iv) Nutrient management in major fruit crops v) Vermicompost ing	i) Balance fertilization and fertilizer scheduling ii) Organic farming iii)Organic farming and use of bio-fertilizer in horticultural crops	i) Publication of bulletin entitled "Preparation of vermicompost from organic waste" ii) Advisory services iii) Popular article on "balance fertilization" iv) Popular article on "Vermicompostin g" v) Delivered talk on organic farming vi) Radio talk on use of organic manure in rice	-

		Cron/					Interventions (if any)		
No	Thrust area	Crop/ Enterprise	Identified Problem	Title of OFT	Title of FLD	Title of Training	Title of training for extension personnel	Extension activities	Supply of seeds, planting materials
5.	Commercial production of fruits & vegetables	Fruits	Low yield due to poor adoption of appropriate production technology	-	-	i) Raising & management of citrus garden with special referen-ce to orange & lemon.  ii) Produc-tion and management of pine-apple for commercial cultivation  iii) Improved produc-tion techno-logy of banana		i) Advisory services ii) Farmer's field visit iii) Delivered talk on "Quality planting material production" iv) Radio talk on homestead gardening	
		Vegetables	Low yield due to poor adoption of appropriate production technology	-	TPS cultivation	i) Scientific production technology of winter vegetables ii)Production technology of potato with special reference to TPS	-	i) Publication of bulletin on " Growing potato through TPS" ii) Advisory services	Seed & fertilizer
6	Composite fish farming	Fishery	Low yield per unit area	-	-	i) Integrated fish farming ii) Composite fish culture	-	-	-

		Crop/			Interventions (if any)						
No	Thrust area	Enterprise	Identified Problem	Title of OFT	Title of FLD	Title of Training	Title of training for extension personnel	Extension activities	Supply of seeds, planting materials		
7	Integrated Pest Management	Rice, fruits & vegetables	Injudicious use of chemical pesticides	Effect of bio- control agent in controlling tomato wilt	-	i) IPM in rice ii) IPM in major rabi vegetable crops	i Use of bio-agents in insect pest and disease management ii) Insect pest and disease management in major fruit crops	i) Advisory services ii) Collaborative awareness campaign on IPM iii) Popular article on " Ecofriendly approaches in agriculture"	-		

## **Results of On Farm Trials**

Crop/ enterprise	Farming situation	Problem Diagnosed	Title of OFT	No. of trials*
1	2	3	4	5
Rice	Rainfed lowland	Low yield due to non availability of suitable scented rice varieties	Performance of scented rice varieties in the farmers field	7
Black gram	Rainfed upland	Poor response to applied nutrients due to soil acidity	Response of black gram (var. Pant U 19) to liming and fertilization	3
Toria	Rainfed upland	Low crop yield due to poor plant stand under late sown condition	Performance of late sown toria ( Var. TS-36) grown after Sali paddy	3
Tomato	Irrigated upland	Crop loss due to wilt	Effect of bio- control agent in controlling tomato wilt	4
Boro rice	Irrigated meduum land	Low yield due to non availability of suitable HYV of rice for summer season	Performance of boro rice varieties in the farmers field	2

<sup>\*</sup> No. of farmers

Technology Assessed	Parameters of assessment	Data on the parameter	Results of assessment
6	7	8	9
Scented rice varieties with recommended package of practices i) Ketekijoha	Grain yield	2920	Scented rice varieties "Ketekijoha" and "Bakuljoha" produced higher yield compared to local check
ii) Bakuljoha		2730	
Application of manure and fertilizer @ FYM 4.5t ha <sup>-1</sup> and 15:35:0 kg ha <sup>-1</sup> of N : P <sub>2</sub> O <sub>5</sub> : K <sub>2</sub> O + lime 5.0 q ha <sup>-1</sup>	Grain yield	595	Application of fertilizer as per recommended dose + lime (@ 5.0 q/ha) resulted in higher crop yield compared to farmer's practice
Recommended package of practices of toria with 33% higher seed rate i.e. 13.3 kg ha	Crop yield	675	Recommended package of practices of toria with 33% higher seed rate recorded higher yield
Seed , seedling and soil treatment with Biofor-PF for controlling tomato wilt	Crop yield	84105	Application of Biofor-PF reduced wilt disease in tomato and resulted in crop yield
	Crop damage	11%	
Boro rice varieties with recommended package of practices i) NBR-2 ii) NBR-3	Grain yield	5100 4500	Variety NBR-2 is at per with Joymati but NBR-3 is inferior

Feedback from the farmer	Any refinement done	Justification for refinement
10	11	12
i) May replace local varieties     ii)Supply of quality seed need to be ensured     iii) Need organic cultivation practices for scented rice	None	NA
i) Need suitable varieties for rainy season     ii)Fertilizer & Lime requirement based on soil testing     iii)Research need for potassium management	None	NA
i) Need minimum tillage technology     ii) Require life saving irrigation at later stages     iii) Technology may be considered under late sown condition	None	NA
i) Help in reducing tomato wilt     ii) May substitute chemical pesticides     iii) Suitable for organic system of cultivation	None	NA
i) May replace local varieties ii) Supply of quality seed need to ensured iii) Farmer need short duration varieties with comparatively higher yield	None	NA

Technology Assessed / Refined	*Production per unit	Net Return (Profit) in Rs. / unit	BC Ratio
13	14	15	16
Farmer's practice**  Local rice variety " Kola joha" with recommended package of practices	2400	11,913.00	1.71
Technology assessed** Scented rice varieties with recommended package of			
practices i) Ketekijoha	2920	18,153.00	2.07
ii) Bakuljoha	2730	15,873.00	1.94
Technology refined**	NA	NA	NA
Farmer's practice**  Application of organic manure @ 4.5t ha-1 and fertilizer @ 15:35:0 kg ha-1 of N : P <sub>2</sub> O <sub>5</sub> : K <sub>2</sub> O in black gram	450	8,770.00	1.95
Technology assessed**  Application of manure @ FYM 4.5t ha-1 and fertilizer @ 15:35:0 kg ha-1 of N: P <sub>2</sub> O <sub>5</sub> : K <sub>2</sub> O + lime 5.0 q ha-1	595	10570.00	1.80
Technology refined**	NA	NA	NA
Farmer's practice** Growing of toria with recommended seed rate i.e. 10 kg ha-1	525	4,225.00	1.47
Technology assessed** Recommended package of practices of toria with 33% higher seed rate i.e. 13.3 kg ha	675	7375.00	1.78
Technology refined**	NA	NA	NA
Farmer's practice** Application of Chemical pesticides for controlling tomato wilt	56019	1,14,607.00	3.14
Technology assessed** Seed , seedling and soil treatment with Biofor-PF for controlling tomato wilt	84105	1,54,815.00	2.58
Technology refined**	NA	NA	NA
Farmers practice HYV of Boro rice with recommended package of Practices	5100	17,250.00	1.82
Technology Assessed Boro rice varieties with recommended package of Practices i. BR-2 ii. BR-3	5100 4500	17,250.00 12,750.00	1.82 1.61

<sup>\*</sup>Field crops – kg/ha, \* for horticultural crops -= kg or t / ha, \* milk and meat – litres or kg/animal, \* for mushroom and Vermicompost kg/unit area.

\*\* Give details of the technology assessed or refined and farmer's practice

#### Notes:

Technology Assessment refers to any technology (preferably new) going for assessment through OFT for the first time in a micro location.

Technology Refinement refers to an already assessed technology getting refined through OFT to suit micro location needs for later demonstration.

If any OFT was conducted for refinement, kindly mention whether the technology was assessed earlier or not. If not, provide reasons.

Technologies older than 5 years have to be preferably avoided for OFTs.

#### **Examples:**

Technology selected for assessment (and/or) refinement (Ex: Rice Var: XXXXXX)

Source of technology with year of release (Ex: ICAR RC NEH, Barapani, 2007)

Production system and thematic area (Ex: Crop production & Weed management)

Performance indicators of the technology (Ex: Yield, Shelf life etc)

#### **Achievements of Frontline Demonstrations**

#### Follow-up for results of FLDs implemented during previous years

List of technologies demonstrated during previous year and popularized during 2007-08 and recommended for large scale adoption in the district

No	Thematic Area*	Technology	Details of popularization methods suggested to the Extension	Horizo	ntal spread of technol	logy
NO	Thematic Area	demonstrated	system	No. of villages	No. of farmers	Area in ha
1	Crop production and Crop management	Improved crop management practices in boro rice	-Organizing training programme -Interaction with farmers -Providing information about the source of seed - Farmer's field visit - Advisory services -Distribution of bulletins	8	102	40
2	Crop production and Crop management	Improved production technology of sesame (var. AST-1)	- Organizing field day - Farmer's field visit - Advisory services -Interaction with farmers -Distribution of bulletins -Providing information about the source of seed	4	25	9
3	Crop production and Crop management	Improved production technology of rapeseed (TS-36)	- Farmer's field visit - Advisory services - Organizing training programme - Interaction with farmers - Distribution of bulletins	10	107	52

	-Providing information about the source of seed		

No	Thematic Area*	Technology	Details of popularization methods suggested to the Extension	Horizo	ntal spread of technol	ogy
NO	Thematic Area	demonstrated	system	No. of villages	No. of farmers	Area in ha
4	Crop production and Crop management	Improved production technology of black gram (var. PU-19)	- Farmer's field visit - Advisory services -Organizing training programme -Interaction with farmers -Distribution of bulletins -Providing information about the source of seed	6	32	16
5	Crop production and high yielding variety	High yielding variey of lentil (var. B-77)	-Organizing training programme - Farmer's field visit - Advisory services -Interaction with farmers -Providing information about the source of seed	5	17	9
6.	Crop production and management	Irrigation management i8n potato (Var: Kufrijyoti)	Organizing field day     Farmer's field visit     Advisory services     Interaction with farmers     Distribution of bulletins     Providing information about the source of seed	7	20	15

<sup>\*</sup> Thematic areas as given in Table on Training

Details of FLDs implemented during 2007-08 (Information is to be furnished in the following three tables for each category i.e. cereals, horticultural crops, oilseeds, pulses, cotton and commercial crops.)

#### (i) Oilseed

No.	Crop	Thematic	Technology	Season	Area	(ha)	No. of	farmers/demo	nstration	Reasons for shortfall in achievement	
NO.	Crop	area	Demonstrated	and year	Proposed	Actual	SC/ST	Others	Total	neasons for shortian in achievement	
1	sesame	Crop management	Improved crop management practices in sesame	Kharif, 2007-08	5.0	5.0	5	10	15	NA	
2	Toria	Crop management	Improved crop management practices in toria	Rabi, 2007-08	5.0	5.0	1	10	11	NA	
3	Toria	Water manageme nt	Application of 6cm irrigation water at flowering or at seliqua development stage	Rabi, 2007-08	2.0	2.0	2	1	3	NA	

# Details of farming situation

eason	arming tuation Irrigated)	unation rrigated) rrigated) ous crop ing date	/ing date	vest date	nal rainfall (mm)	No. of rainy days				
S	F <sub>s</sub> si (RF/	й	N	Р	К	Prev	Sow	Han	Seaso	No. of
Kharif	Rainfed	Sandy loam	-	-	-	Potato, Summer vegetabl es	Aug 5- Sept 22 ,2007	Nov 22- Dec 29,2007	738.2	45
Rabi	Rainfed	do-	-	-	-	Rice	Oct 28- Nov 19,2007	Feb 8- 22,2008	66.6	6
Rabi	Irrigated	do-	-	-	-	Rice	Nov. 7-15, 2007	Feb 12- 21, 2008	66.6	6
	Rabi	Kharif Rainfed  Rabi Rainfed	Kharif Rainfed Sandy loam  Rabi Rainfed do-	Kharif Rainfed Sandy loam - Rabi Rainfed do	Kharif Rainfed Sandy loam Rabi Rainfed do	Kharif Rainfed Sandy Rabi Rainfed do	Kharif Rainfed Sandy loam P K  Rabi Rainfed do Rice  Rabi Rainfed do Rice	Kharif   Rainfed   Sandy   -   -   -   Potato, Summer vegetable   Rabi   Rainfed   do-   -   -   -   Rice   Nov   19,2007     Rabi   Irrigated   do-   -   -   Rice   Nov   7-15,	Rabi   Rainfed   Sandy   -   -   -     Rice   Nov.   Feb   12-   7-15,   21, 2008   Rabi   Rainfed   Rai	Rabi   Rainfed   Sandy   Company   Company

# Performance of FLD

No	Crop	Technology Demonstrated	Variety	No. of Farmers	Area (ha.)
1	2	3	4	5	6
1	Sesame	Improved crop management practices in sesame	AST-1	15	5.0
2	Toria	Improved crop management practices in toria	TS-36	11	5.0
3	Toria	Application of 6cm irrigation water at flowering or at siliqua development stage	TS-36	3	2.0

NB: Attach few good action photographs

Demo. Yield Qtl/ha		tl/ha	Yield of local Check Qtl./ha	Increase in yield (%)	Data on parameter in relation to technology demonstrated		
Н	L	Α	rield of local Check Gil./Ila	ied of local check Qu./na		Local	
7	8	9	10	11	12	13	
7.5	4.5	5.69	4.41	29.02	-	-	
9.0	7.5	8.35	6.63	25.9	-	-	

15.0	13.5	14.25	10.25	39.0	-	-

# Economic Impact (continuation of previous table)

Average Cost o		Average Gross R	eturn (Rs./ha)	Average Net Re (Rs./l	Benefit-Cost Ratio (Gross Return /	
Demonstration Local Check		Demonstration	Local Check	Demonstration	Local Check	Gross Cost)
14	15	16	17	18	19	20
7866.00	6620.00	28450.00	22050.00	20584.00	15430.00	3.61
8572.00	6800.00	20875.00	16575.00	12303.00	9775.00	2.44
12,872.00	12,700.00	39,812.00	28,687.50	26,940.00	15,987.50	3.09

#### (ii) Pulse

No	Cuan	Thematic	Technology	Season	Area	(ha)	No. of	farmers/demo	nstration	Reasons for shortfall in achievement
No.	Crop	area	Demonstrated	and year	Proposed	Actual	SC/ST	Others	Total	Reasons for shortiall in achievement
1	Black gram	Crop managemen	Improved crop management practices in black gram	Kharif, 2007-08	5.0	5.0	4	12	16	NA
2	Lentil	Improved variety	High yielding variety of lentil	Rabi, 2007- 08	5.0	5.0	4	7	11	NA

# Details of farming situation

Crop	Season	arming tuation Irrigated)	Soil type	Status of soil			ious crop	ving date	vest date	nal rainfall (mm)	rainy days
	S	si Si (RF/	σ	N	Р	К	Prev	Sov	Har	Seasonal (mr	No. of
Black	Kharif	Rainfed	Sandy	-	-	-	Summer	Aug 20-	Dec 1-	738.2	45

gram		upland	loam				vegetable , fallow	Sept 21,2007	21,2007		
Lentil	Rabi	Rainfed upland	Sandy loam	-	-	-	Rice	Nov 4- 14,2007	March 3-15, 2008	103.4	9

# Performance of FLD

No	Crop	Technology Demonstrated	Variety	No. of Farmers	Area (ha.)
1	2	3	4	5	6
1	Black gram	Improved crop management practices in black gram	Pant U -19	16	5.0
2	Lentil	High yielding variety of lentil	B-77	11	5.0

NB: Attach few good action photographs

De	Demo. Yield Qtl/ha		Yield of local Check Qtl./ha	Increase in yield (%)	Data on parameter in relation to technology demonstrated		
Н	L	Α	Tield of local Check Qui./ila	micrease iii yield (76)	Demo	Local	
7	8	9	10	11	12	13	
6.9	5.12	5.91	4.63	27.6	-	-	
7.5	4.5	6.44	5.57	15.6	-	-	

## **Economic Impact (continuation of previous table)**

Average Cost (Rs./		Average Gross R	leturn (Rs./ha)		Average Net Return (Profit) (Rs./ha)		
Demonstration Local Check		Demonstration	Local Check	Demonstration	Local Check	(Gross Return / Gross Cost)	
14	15	16	17	18	19	20	
8762.00	7250.00	23640.00	18520.00	14878.00	11270.00	2.70	
7850.00	7850.00	32200.00	27850.00	24350.00	20000.00	4.10	

# (iii) Cereals

No.	Crop	Thematic	Technology	Season	Area	(ha)	No. of	farmers/dem	onstration	Reasons for shortfall in achievement
NO.	Crop	area	Demonstrated	and year	Proposed	Actual	SC/ST	Others	Total	Heasons for shortian in achievement
1	Rice	Water managem ent	Application of 5 cm irrigation water at 3 days after transplanting and subsequent irrigation at 3 days after disappearance of ponded water till 10-15 days before harvest	Rabi, 2007-08	2.0	2.0	-	3	3	NA

# Details of farming situation

Crop	Season	arming tuation Irrigated)	Soil type	Sta	itus of	soil	ious crop	Sowing date	vest date	onal rainfall (mm)	of rainy days
	0	Fa sit (RF/II	Ö	N	Р	К	Prev	Sov	Har	Seasc	No. of
Rice	Rabi	Irrigated lowland	Sandy loam to loam	-	-	-	Sali rice, fallow	Dec 8- 12,2007	May 25- 27, 2008	971.1	44

## Performance of FLD

No	Crop	Technology Demonstrated	Variety	No. of Farmers	Area (ha.)
1	2	3	4	5	6
1	Rice	Application of 5 cm irrigation	Joymati, BR-8	3	2.0

NB: Attach few good action photographs

De	Demo. Yield Qtl/ha		Yield of local Check Qtl./ha	Increase in yield (%)	Data on parameter in relation to technology demonstrated			
Н	L	Α	Tield of local Check Qu./ila	liiciease iii yieiu (78)	Demo	Local		
7	8	9	10	11	12	13		
66.0	60.0	63.0	51.0	23.5	-	-		

# Economic Impact (continuation of previous table)

	Average Cost of cultivation (Rs./ha)		Average Gross Return (Rs./ha)		Average Net Return (Profit) (Rs./ha)		
Demonstration	Local Check	Demonstration	Local Check	Demonstration	Local Check	- (Gross Return / Gross Cost)	
14	15	16	17	18	19	20	
26,489.50	27,162.50	49,500.00	40,250.00	23,010.50	13,087.50	1.86	

(iii) Commercial crop

No.	Crop	Thematic	Technology	Season	Area	(ha)	No. of	farmers/demo	nstration	Reasons for shortfall in achievement
IVO.	Crop	area	Demonstrated	and year	Proposed	Actual	Actual SC/ST Others Total		neasons for shortian in achievement	
1	Potato	Water managem ent	Application of 4 cm irrigation water at stolonization,tu berization and tuber development stage	Rainfed upland	1.0	1.0	-	1	1	
2	TPS	Crop manag ement	Production technology of TPS	Rainfed upland	0.4	0.4	-	6	6	

# Details of farming situation

Crop	Season	Farming situation (RF/Irrigated)	Soil type	Sta	itus of	soil	Previous crop	Sowing date	Harvest date	Seasonal rainfall (mm)	No. of rainy days
		F si (RF)	S	N	Р	К	Prev	Sov	Far	Seasc	No. o
Potato	Rabi	Irrigated	Sandy loam	-	-	-	Vegetabl es	Nov 14, 2007	Feb 29 to Mar 4, 2008	66.6	6
TPS	Rabi	Rainfed	Sandy loam	1	-	-	Vegetabl es	Nov 2,2007	March 27- 31,2008	66.6	6

## Performance of FLD

No	Crop	Technology Demonstrated	Variety	No. of Farmers	Area (ha.)
1	2	3	4	5	6
1	Potato	Application of 4 cm irrigation water at stolonization, tuberization and tuber development stage	Kufri jyoti	1	1.0
2	TPS	Production technology of TPS	HPS 1/13	6	0.4

NB: Attach few good action photographs

De	Demo. Yield Qtl/ha		Yield of local Check Qtl./ha	Increase in yield (%)	Data on parameter in relation to technology demonstrated		
Н	L	Α	Held of local Check Qti./Ila	increase in yield (78)	Demo	Local	
7	8	9	10	11	12	13	
-	-	408.0	255.0	60	-	-	
138.0	119.2	127.4	-	-	-	-	

#### Economic Impact (continuation of previous table)

	Average Cost of cultivation (Rs./ha)		Average Gross Return (Rs./ha)		Average Net Return (Profit) (Rs./ha)		
Demonstration	Local Check	Demonstration	Local Check	Demonstration	Local Check	- (Gross Return / Gross Cost)	
14	15	16	17	18	19	20	
60,465.00	59,203.00	1,63,200.00	1,02,000.00	1,02,735.00	42,797.00	2.6	
27900.00	-	50800.00	=	22900.00	-	1.8	

## Analytical Review of component demonstrations (details of each component for rainfed / irrigated situations to be given separately for each season).

Crop	Season	Component	Farming situation	Average yield (q/ha)	Local check (q/ha)	Percentage increase in productivity over local check
Lentil	Rabi	1. Seed/Variety	Rainfed upland	6.44	5.57	15.6
		2. Bio-fertilizer				
		Fertilizer management				
		4. Plant Protection				
		5. Combination of components (Pls specify)				

## Technical Feedback on the demonstrated technologies

No	Feed Back						
1	Higher yield of oilseed and pulse can be achieved with selection of suitable varieties and adoption of improved crop						
	management practices						
2	Timely control of insect pests and diseases can further increase crop yield						
3	Growing period of kharif oilseeds and pulses generally coincides with the rainy weather in Assam. So development of high yielding varieties of these crops which can tolerate water stagnation for some days along with surface drainage technology should be taken into consideration or the variety suitable for late sown condition						
4	Development of technologies for growing toria under late sown condition so that it can fit well into rice (long duration) — toria crop sequence						
5	Application of potassium in pulse crops should be taken into consideration						
6	Irrigation scheduling at critical stages of crop growth is crucial for higher crop yield. So information on these aspects need to be disseminated in the farmer's field						

Farmers' reactions on specific technologies

No	Feed Back
1	Toria variety TS-36 and Sesame variety AST-1are found to be vary high yielding and can produce higher yield
2	Application of chemical fertilizer with recommended doses in addition to organic manure need to be considered for better crop growth and for higher crop yield
3	Recommended rates of seeding i.e. 25kg and 30kg per hectare in black gram and lentil respectively, resulted in higher plant population in the fertile soil which need to be reviewed
4	Seedling age is important in boro rice

Notes (to be strictly followed in formulation of FLDs):
FLDs are conducted only on proven technologies.
FLDs are conducted on previously assessed/refined technologies which are found suitable for the KVK district.
Only latest technologies have to be selected for FLDs (Preferably less than 5 years old).

# Examples:

Same as in case of OFTs
Extension and Training activities under FLD

No.	Activity	No. of activities organized	Date	Number of participants	Remarks
1	Field days	5	O2.01.2008	23	As a part of FLD kharif oilseed
			20.02.2008	68	As a part of FPARP on toria
			29.02.2008	101	As a part of FPARP on potato
			24.05.2008	93	As a part of FPARP on boro rice
			26.05.2008	82	As a part of FPARP on boro rice
2	Farmers	4	08.11.2007	27	i) Scientific cultivation of potato (TPS)
_	Training		17.11.2007 &		
			18.11.2007	28	ii) Production technology of major rabi field crops
			05.01.2008 & 06.01.2008		
			17.01.2008 & 18.01.2008	27	iii) Water management practices in major rabi field crops
			02.09.2008 &		3.350
			03.09.2008	27	iv) Modern techniques of raising boro rice

			08.09.2008 & 09.09.2008		
				27	v) Production Technology of Potato with special reference to TPS
				27	vi) Production technology of major field crops
3	Media coverage	1	27.03.2008	101	Field day programme in FLD on Potato
4	Training for extension functionarie s	Nil	NA	NA	NA

# **Details of FLD on Enterprises**

(i) Farm Implements: Nil

Name of the implement	Crop	No. of farmers	Area (ha)	Performance parameters /	* Data on paramete technology der		% change in the parameter	Remarks
implement				indicators	Demon.	Local check	parameter	

<sup>\*</sup> Field efficiency, labour saving, time saving etc.

(ii) Livestock Enterprises: Nil

Enterprises	Breed	No. of farmers	No. of animals,	Performance parameters /	* Data on parame to technology de	emonstrated	% change in the	Remarks
Litterprises	Dieeu	No. of farmers	poultry birds etc.	indicators	Demon.	Local check	parameter	Hemarks

\* Milk production, meat production, egg production, reduction in disease incidence etc.

#### (iii) Other Enterprises: Nil

Enterprise	Variety/ breed/Species/others	No. of farmers	No. of Units	Performance parameters /	Data on para relation to te demons	chnology	% change in the parameter	Remarks
		Tarmers	Omis	indicators	Demon.	Local check	parameter	
Mushroom								
Apiary								
Sericulture								
Vermicompost								

# PART – III (TRAINING PROGRAMMES)

## 4. Details of training programmes conducted during 2007-08 (Including the sponsored and FLD training programmes):

Note: The proportion of SC and ST participants for all training programmes should match with their proportion in the population of the KVK district.

On Campus: NA

	Courses					No. of	participa	ants			
Thematic area	(No)		Others			SC			ST		Grand Total
	(140)	Male	Female	Total	Male	Female	Total	Male	Female	Total	Grand Total
(A) Farmers & Farm Women											
I Crop Production											
Weed Management											
Nutrient Management											
Resource Conservation Technologies											
Cropping Systems											
Crop Diversification											
Integrated Farming systems											
Water management											
Seed production											
Nursery management											
Integrated Crop Management											
Fodder production											
Production of organic inputs											
II Horticulture										·	
a) Vegetable Crops											

	1	1	ı	1		1		
Production of low volume and high value crops								
Off-season vegetables								
Nursery raising								
Exotic vegetables production								
Production of export potential vegetables								
Grading and standardization								
Protective cultivation (Green Houses, Shade Net etc.)								
b) Fruits								
Training								
Pruning								
Layout and Management of Orchards								
Cultivation of Fruit crops								
Management of young plants/orchards								
Rejuvenation of old orchards								
Cultivation of export potential fruits								
Micro irrigation systems of orchards								
Plant propagation techniques								
c) Ornamental Plants								
Nursery Management								
Management of potted plants								
Production of export potential ornamental plants								
Propagation techniques of Ornamental Plants								
d) Plantation crops								
Production and Management technology								
Processing and value addition								
e) Tuber crops								
Production and Management technology								
Processing and value addition								
f) Spices								
Production and Management technology								
Processing and value addition								
g) Medicinal and Aromatic Plants								
Nursery management								
Production and management technology								
Post harvest technology and value addition								
III Soil Health and Fertility Management								
Soil fertility management								
Soil and Water Conservation								
Integrated Nutrient Management								
Production and use of organic inputs								
Management of Problematic soils								
Micro nutrient deficiency in crops								
Nutrient Use Efficiency								
Soil and Water Testing								
IV Livestock Production and Management							_	
Dairy Management								

Poultry Management			1	l		
Piggery Management						
Rabbit Management	-					
Disease Management	-					
Feed management						
Production of quality animal products						
V Home Science/Women empowerment						
Household food security by nutrition gardening						
Design and development of low/minimum cost diet						
Designing and development for high nutrient efficiency diet						
Minimization of nutrient loss in processing						
Gender mainstreaming through SHGs						
Storage loss minimization techniques						
Value addition						
Income generation activities for empowerment of rural Women		İ				
Location specific drudgery reduction technologies						
Rural Crafts						
Women and child care						
VI Agricultural Engineering						
Installation and maintenance of micro irrigation systems	+					
Use of Plastics in farming practices	+	1				
Production of small tools and implements	+	1				
Repair and maintenance of farm machinery and implements						
Small scale processing and value addition	-					
Post Harvest Technologies	-					
VII Plant Protection						
VII Plant Protection						
Integrated Pest Management						
Disease Management						
Bio-control of pests and diseases						
Production of bio control agents and bio pesticides						
VIII Fisheries						
Integrated fish farming						
Carp breeding and hatchery management						
Carp fry and fingerling rearing						
Composite fish culture						
Hatchery management and culture of freshwater prawn						
Breeding and culture of ornamental fishes	1					
Portable plastic carp hatchery	1					
Pen culture of fish and prawn	1					
Shrimp farming	1					
Edible oyster farming						
Pearl culture	1					
Fish processing and value addition	†					
IX Production of Inputs at site	†					
The readoust of impate at one						

Const Dynatication	1		Ι	l ·	I		1	I	
Seed Production									
Planting material production									
Bio-agents production									
Bio-pesticides production									
Bio-fertilizer production									
Vermicompost production									
Other Organic manures production									
Production of fry and fingerlings									
Production of Bee-colonies and wax sheets									
Small tools and implements									
Production of livestock feed and fodder									
Production of Fish feed									
X Capacity Building and Group Dynamics									
Leadership development in villages									
Managing Group dynamics									
Formation and Management of SHGs									
Mobilization of social capital in villages									
Entrepreneurial development of farmers/youths									
WTO and IPR issues									
XI Agro-forestry									
Production technologies									
Nursery management									
Integrated Farming Systems									
XII Öthers (Pl. Specify)									
TOTAL									
(B) RURAL YOUTH									
Mushroom Production									
Bee-keeping									
Integrated farming									
Seed production									
Production of organic inputs									
Integrated Farming									
Planting material production									
Vermiculture									
Sericulture									
Protected cultivation of vegetable crops									
Commercial fruit production									
Repair and maintenance of farm machinery and implements	1								
Nursery Management of Horticulture crops									
Training and pruning of orchards									
Value addition									
Production of quality animal products									
Dairying	1								
Sheep and goat rearing									
Quail farming			İ						
- Guan ranning	1	1	1		 ·	1	1	·	 I

Piggery						
Rabbit farming						
Poultry production						
Ornamental fisheries						
Training as Para vets						
Training as Para extension workers						
Composite fish culture						
Freshwater prawn culture						
Fish harvest and processing technology						
Fry and fingerling rearing						
Small scale processing						
Post Harvest Technology						
Tailoring and Stitching						
Rural Crafts						
TOTAL						
(C) Extension Personnel						
Productivity enhancement in field crops						
Integrated Pest Management						
Integrated Nutrient management						
Rejuvenation of old orchards						
Protected cultivation technology						
Formation and Management of SHGs						
Group Dynamics and farmers organizations						
Information networking among farmers						
Capacity building for ICT application						
Care and maintenance of farm machinery and implements						
WTO and IPR issues						
Management in farm animals						
Livestock feed and fodder production						
Household food security						
Women and Child care						 -
Low cost and nutrient efficient diet designing						
Production and use of organic inputs	-					
Gender mainstreaming through SHGs						
Any other (Pl. Specify)						
TOTAL						

# Off Campus:

	Courses					No. of	participa	ants			
Thematic area	(No)		Others			SC			ST		Grand Total
	(NO)	Male	Female	Total	Male	Female	Total	Male	Female	Total	Grand Total
(A) Farmers & Farm Women											
I Crop Production											
Weed Management	1	26	-	26	-	-	-	-	-	-	26
Nutrient Management											

Resource Conservation Technologies						1	1	1	1	1	
Cropping Systems	3	55	6	61	4	1	5	9	1	10	76
Crop Diversification	3	33	0	01	4	1	5	9	+ -	10	76
Integrated Farming systems											
Water management	1	24		24	+			3	-	3	27
	1	29	-	29	+-	+-	-	-	1 -	- -	29
Seed production	- 1	29	-	29	-	-	-	-	-	-	29
Nursery management	-	89	+-	0.4	00	1	07	10	1	10	104
Integrated Crop Management Fodder production	5	89	5	94	26	1	27	12	1	13	134
Production of organic inputs											
II Horticulture											
a) Vegetable Crops											
Production of low volume and high value crops											
Off-season vegetables											
Nursery raising	1	13	6	19	2	1	3	3	1	4	26
Exotic vegetables production											
Production of export potential vegetables											
Grading and standardization											
Protective cultivation (Green Houses, Shade Net etc.)											
b) Fruits											
Training											
Pruning											
Layout and Management of Orchards											
Cultivation of Fruit crops	1	14	4	18	2	-	2	8	-	8	28
Management of young plants/orchards											
Rejuvenation of old orchards											
Cultivation of export potential fruits											
Micro irrigation systems of orchards											
Plant propagation techniques											
c) Ornamental Plants											
Nursery Management											
Management of potted plants											
Production of export potential ornamental plants											
Propagation techniques of Ornamental Plants											
d) Plantation crops											
Production and Management technology											
Processing and value addition								1	1		
e) Tuber crops								1	1		
Production and Management technology	2	39	7	46	2	1	3	3	1	4	53
Processing and value addition								1	1		-
f) Spices							1	1	1		
Production and Management technology							1	<b>†</b>	<b>†</b>	1	
Processing and value addition						1	1	1	1		
g) Medicinal and Aromatic Plants							1	<b>†</b>	<b>†</b>	1	
Nursery management							1	<b>†</b>	<b>†</b>	1	
											1

Post harvest technology and value addition				1	1	1				1	
III Soil Health and Fertility Management											
Soil fertility management											
Soil and Water Conservation											
Integrated Nutrient Management	2	47	+	47	-	1_	_	6	-	6	53
Production and use of organic inputs	1	17	+	17	6	1_	6	5	-	5	28
Management of Problematic soils	<u>'</u>	17		17	10	-	U	3		3	20
Micro nutrient deficiency in crops											
Nutrient Use Efficiency											
Soil and Water Testing				1							
IV Livestock Production and Management											
_											
Dairy Management											
Poultry Management											
Piggery Management											
Rabbit Management											
Disease Management											
Feed management											
Production of quality animal products											
V Home Science/Women empowerment											
Household food security by nutrition gardening											
Design and development of low/minimum cost diet											
Designing and development for high nutrient efficiency diet											
Minimization of nutrient loss in processing											
Gender mainstreaming through SHGs											
Storage loss minimization techniques											
Value addition											
Income generation activities for empowerment of rural Women											
Location specific drudgery reduction technologies											
Rural Crafts											
Women and child care											
VI Agricultural Engineering											
Installation and maintenance of micro irrigation systems											
Use of Plastics in farming practices											
Production of small tools and implements											
Repair and maintenance of farm machinery and implements											
Small scale processing and value addition				<u> </u>							
Post Harvest Technologies				<u> </u>							
VII Plant Protection			1								
Integrated Pest Management	1	35	-	35	-	-	-	-	-	-	35
Disease Management		1		†	1						1
Bio-control of pests and diseases				<u> </u>							1
Production of bio control agents and bio pesticides				<u> </u>							1
VIII Fisheries			1	1							
Integrated fish farming			+								
integrated non iditining	1		1	1	l .	1	1	I	l .	l	

	T		1		1	1		1	1	1	T
Carp breeding and hatchery management											
Carp fry and fingerling rearing											
Composite fish culture											
Hatchery management and culture of freshwater prawn											
Breeding and culture of ornamental fishes											
Portable plastic carp hatchery											
Pen culture of fish and prawn											
Shrimp farming											
Edible oyster farming											
Pearl culture											
Fish processing and value addition											
IX Production of Inputs at site											
Seed Production											
Planting material production											
Bio-agents production											
Bio-pesticides production											
Bio-fertilizer production											
Vermicompost production											
Other Organic manures production											
Production of fry and fingerlings											
Production of Bee-colonies and wax sheets											
Small tools and implements											
Production of livestock feed and fodder											
Production of Fish feed											
X Capacity Building and Group Dynamics											
Leadership development in villages											
Managing Group dynamics											
Formation and Management of SHGs											
Mobilization of social capital in villages											
Entrepreneurial development of farmers/youths											
WTO and IPR issues											
XI Agro-forestry											
Production technologies							<u> </u>				
Nursery management											
Integrated Farming Systems											
XII Sericulture)											
Rearing of Endi and Muga	1	1	-	1	-	-	-	6	22	28	29
TOTAL	20	389	28	417	42	4	46	55	26	81	544
(B) RURAL YOUTH											
Mushroom Production											
Bee-keeping											
Integrated farming (Bamboo cultivation)	1	12	6	18	2	1	3	3	1	4	25
Seed production											
Production of organic inputs											

Integrated Forming		54	27	0.1	14	1	1	1		T _	1 00
Integrated Farming	3			81	1	-		-	-		82 27
Planting material production	1	25	-	25	-	-	-	2	-	2	
Vermiculture	1	17	-	17	2	-	2	8	-	8	27
Sericulture											
Protected cultivation of vegetable crops					_						
Commercial fruit production	2	25	-	25	2	-	2	25	-	25	52
Repair and maintenance of farm machinery and implements											
Nursery Management of Horticulture crops						1					
Training and pruning of orchards	1	27	-	27	-	-	-	-	-	-	27
Value addition											
Production of quality animal products											
Dairying											
Sheep and goat rearing											
Quail farming											
Piggery	1	20	5	25	-	-	-	-	-	-	25
Rabbit farming											
Poultry production	1	1	6	7	-	-	-	4	14	18	25
Ornamental fisheries											
Training as Para vets											
Training as Para extension workers											
Composite fish culture											
Freshwater prawn culture											
Fish harvest and processing technology											
Fry and fingerling rearing											
Small scale processing											
Post Harvest Technology	1	-	20	20	-	3	3	-	4	4	27
Tailoring and Stitching							1				
Rural Crafts											
TOTAL	12	181	64	245	7	4	11	42	19	61	317
(C) Extension Personnel		1	1			-			1		
Productivity enhancement in field crops						1					
Integrated Pest Management	3	53	-	53	12	_	12	12	<del>-</del>	12	77
Integrated Nutrient management	1	21	<u> </u>	21	2	-	2	2	+-	2	25
Rejuvenation of old orchards	<u> </u>	<u> </u>		<del>  -</del> -	-			_		+-	120
Protected cultivation technology	1	27	-	27	-	+-	_	1	-	1	28
Formation and Management of SHGs	+ '			+				1			120
Group Dynamics and farmers organizations		-				-					
Information networking among farmers		+									
Capacity building for ICT application	+					+					
Care and maintenance of farm machinery and implements				+	+	+	+	+			
WTO and IPR issues	+					+	+		1		
Management in farm animals	+					+	+		1		
Livestock feed and fodder production					-	-	-	-	+		
			-	-		+	-				
Household food security						+					
Women and Child care			1		_	+	-	-	1		
Low cost and nutrient efficient diet designing			_1								

Production and use of organic inputs	2	40	-	40	4	-	4	6	-	6	50
Gender mainstreaming through SHGs											
Any other (Pl. Specify)	3	66	-	66	6	-	6	6	-	6	78
Soil quality management											
Soil moisture conservation	1	28	-	28	4	-	4	2	-	2	34
TOTAL	10	235	-	235	28	-	28	29	-	29	292

# Consolidated table (On + Off + Sponsored + Vocational)

Thematic area	Солическ	No. of participants										
	Courses	Others			SC			ST			Cuand Tatal	
	(No)	Male	Female	Total	Male	Female	Total	Male	Female	Total	Grand Total	
(A) Farmers & Farm Women												
I Crop Production												
Weed Management	1	26	-	26	-	-	-	-	-	-	26	
Nutrient Management												
Resource Conservation Technologies												
Cropping Systems	3	55	6	61	4	1	5	9	1	10	76	
Crop Diversification												
Integrated Farming systems												
Water management	1	24	-	24	-	-	-	3	-	-	27	
Seed production	1	29	-	29	-	-	-	-	-	-	29	
Nursery management												
Integrated Crop Management	5	89	5	94	26	1	27	12	1	13	134	
Fodder production												
Production of organic inputs												
Il Horticulture												
a) Vegetable Crops												
Production of low volume and high value crops												
Off-season vegetables												
Nursery raising	1	13	6	19	2	1	3	3	1	4	26	
Exotic vegetables production												
Production of export potential vegetables												
Grading and standardization												
Protective cultivation (Green Houses, Shade Net etc.)												
b) Fruits												
Training												

					•					,	1
Pruning											
Layout and Management of Orchards											
Cultivation of Fruit crops											
Management of young plants/orchards											
Rejuvenation of old orchards											
Cultivation of export potential fruits											
Micro irrigation systems of orchards											
Plant propagation techniques											
c) Ornamental Plants											
Nursery Management											
Management of potted plants											
Production of export potential ornamental plants											
Propagation techniques of Ornamental Plants											
d) Plantation crops											
Production and Management technology											
Processing and value addition											
e) Tuber crops											
Production and Management technology	2	39	7	46	2	1	3	3	1	4	53
Processing and value addition											
f) Spices											
Production and Management technology											
Processing and value addition											
g) Medicinal and Aromatic Plants											
Nursery management											
Production and management technology											
Post harvest technology and value addition											
III Soil Health and Fertility Management											
Soil fertility management											
Soil and Water Conservation											
Integrated Nutrient Management	2	47	-	47	-	-	-	6	-	6	53
Production and use of organic inputs	1	17	-	17	6	-	6	5	-	5	28
Management of Problematic soils											
Micro nutrient deficiency in crops											
Nutrient Use Efficiency											
Soil and Water Testing											
IV Livestock Production and Management											
_											
Dairy Management											
Poultry Management											
Piggery Management											
Rabbit Management	+										
Disease Management	+										
Feed management	+										
Production of quality animal products	1										
V Home Science/Women empowerment											
Household food security by nutrition gardening											

			1	1		1			1	1	
Design and development of low/minimum cost diet											
Designing and development for high nutrient efficiency diet											
Minimization of nutrient loss in processing											
Gender mainstreaming through SHGs											
Storage loss minimization techniques											
Value addition											
Income generation activities for empowerment of rural Women											
Location specific drudgery reduction technologies											
Rural Crafts											
Women and child care											
VI Agricultural Engineering											
Installation and maintenance of micro irrigation systems											
Use of Plastics in farming practices											
Production of small tools and implements											
Repair and maintenance of farm machinery and implements											
Small scale processing and value addition											
Post Harvest Technologies											
VII Plant Protection											
	-	٥٢		٥٢				_	_		0.5
Integrated Pest Management	1	35	-	35	-	-	-	-	-	-	35
Disease Management											
Bio-control of pests and diseases											
Production of bio control agents and bio pesticides											
VIII Fisheries											
Integrated fish farming											
Carp breeding and hatchery management											
Carp fry and fingerling rearing											
Composite fish culture											
Hatchery management and culture of freshwater prawn											
Breeding and culture of ornamental fishes											
Portable plastic carp hatchery											
Pen culture of fish and prawn											
Shrimp farming											
Edible oyster farming											
Pearl culture											
Fish processing and value addition											
IX Production of Inputs at site											
Seed Production							<u> </u>				
Planting material production											
Bio-agents production	1										
Bio-pesticides production											
Bio-fertilizer production											
Vermicompost production			1		<del>                                     </del>		<del>                                     </del>	<u> </u>			
Other Organic manures production								<b>-</b>			
Production of fry and fingerlings		+						<b>-</b>			
r roudelion or my and imgenings				l	l		l	l	l		

						1	1				
Production of Bee-colonies and wax sheets									<b></b>		
Small tools and implements											
Production of livestock feed and fodder									<b></b>		
Production of Fish feed											
X Capacity Building and Group Dynamics											
Leadership development in villages											
Managing Group dynamics											
Formation and Management of SHGs											
Mobilization of social capital in villages											
Entrepreneurial development of farmers/youths											
WTO and IPR issues											
XI Agro-forestry											
Production technologies											
Nursery management											
Integrated Farming Systems											
XII Others (Pl. Specify) Rearing of Endi and Muga	1	1	-	1	-	-	-	6	22	28	29
TOTAL	20	389	28	417	42	4	46	55	26	81	544
(B) RURAL YOUTH											
Mushroom Production											
Bee-keeping											
Integrated farming (bamboo cultivation)	1	12	6	18	2	1	3	3	1	4	25
Seed production											
Production of organic inputs											
Integrated Farming	3	54	27	81	1	-	1	-	-	-	82
Planting material production	1	25	-	25	-	-	-	2	-	2	27
Vermiculture	1	17	-	17	2	-	2	8	-	8	27
Sericulture											
Protected cultivation of vegetable crops											
Commercial fruit production	2	25	-	25	2	-	2	25	-	25	52
Repair and maintenance of farm machinery and implements											
Nursery Management of Horticulture crops											
Training and pruning of orchards	1	27	-	27	T -	-	-	-	-	-	27
Value addition											
Production of quality animal products											
Dairying											
Sheep and goat rearing										I	
Quail farming											
Piggery	1	20	5	25	-	-	-	-	-	-	25
Rabbit farming											
Poultry production	1	1	6	7	-	-	-	4	14	18	25
Ornamental fisheries											
Training as Para vets											
Training as Para extension workers											
Composite fish culture	ĺ										
Freshwater prawn culture											

Fish harvest and processing technology											
Fry and fingerling rearing											
Small scale processing											
Post Harvest Technology	1	-	20	20	-	3	3	-	4	4	27
Tailoring and Stitching											
Rural Crafts											
TOTAL	12	181	64	245	7	4	11	42	19	61	317
(C) Extension Personnel											
Productivity enhancement in field crops											
Integrated Pest Management	3	53	-	53	12	-	12	12	-	12	77
Integrated Nutrient management	1	21	-	21	2	-	2	2	-	2	25
Rejuvenation of old orchards											
Protected cultivation technology	1	27	-	27	-	-	-	1	-	1	28
Formation and Management of SHGs											
Group Dynamics and farmers organizations											
Information networking among farmers											
Capacity building for ICT application											
Care and maintenance of farm machinery and implements											
WTO and IPR issues											
Management in farm animals											
Livestock feed and fodder production											
Household food security											
Women and Child care											
Low cost and nutrient efficient diet designing											
Production and use of organic inputs											
Gender mainstreaming through SHGs	2	40	-	40	4	-	4	6	-	6	50
Any other (Pl. Specify) soil quality management	3	66	-	66	6	-	6	6	-	6	78
soil moister conservation	1	28	-	28	4	-	4	2	-	2	34
TOTAL	11	235	-	235	28	-	28	29	-	29	292

Note: Please furnish the details of training programmes as Annexure in the proforma given below

Date	Client	Title of the training	Duration in days	Off / On Campus	Numbe	er of particip	ants	Nu	mber of SC/	ST
	eie		iii uays	Campus	Male	Female	Total	Male	Female	Total
		CROP PRODUCTION								
Nov 17-18, 07	PF	Production Technology of major Rabi Field crops	2	Off	28	-	28	7	-	7
Dec 18, 07	EF	Soil quality Management	1	Off	22	-	22	4	-	4
Jan 5-6, 08	PF	Water Management Practices in major Rabi Field crops	2	Off	27	-	27	3		3
Jan 17-18, 08	PF	Modern technique of raising Boro rice	2	Off	27	-	27	24	-	24
Feb 11-13, 08	PF	Seed Production Technology of Major Field crops	3	Off	29	-	29	-	-	-
Feb 16, 08	PF	Green Manuring Practices	1	Off	27	-	27	6	-	6

Feb 18-19,	PF	Has of Die festiliers in aven much stiere	0	Off	00		00	_		
08	PF	Use of Bio-fertilizer in crop production	2	Oli	26	-	26	-	-	-
Feb 21-22, 08	EF	Balance fertilization and fertilizer scheduling in major field crops	2	Off	25	-	25	4	-	4
Mar 8, 08	EF	Organic farming	11	Off	25	-	25	3	-	3
Mar 25, 08	PF	Integrated Weed Management Practices in Ahu rice	1	Off	26	-	26	-	-	-
Mar 26, 08	PF	Multiple cropping system	1	Off	25	-	25	7	-	7
Mar 30-31, 08	EF	Agril. Practices for soil moisture conservation	2	Off	34	-	34	6	-	6
May 12-13, 08	PF	Multiple cropping system	2	Off	26	-	26	1	-	1
May 27-28, 08	PF	Preparation of various organic manure and their application in crops	2	Off	28	-	28	11	-	11
June 11-13, 08	PF	Modern technique of raising Sali rice	3	Off	27	-	27	2	0	2
July 23-25, 08	PF	Modern technique of raising Sali rice	3	Off	25	-	25	-	-	-
Aug 24-26, 08	RY	Contingency Crop planning for flood effected areas	3	Off	19	11	30	-	-	-
Sept 02 , 08	RY	Cultivation Technique of Bamboo	1	Off	18	7	25	5	2	7
Sept 5- 6, 08	EF	Contingency Crop planning for flood effected areas	2	Off	19	7	26	5	2	7
Sept 8-9,08	PF	Production Technology of major Rabi field crops HORTICULTURE	2	Off	20	7	27	5	2	7
Nov 8, 07	PF	Scientific cultivation of Potato	1	Off	27	-	27	-	-	-
Dec 20-22, 07	EF	Low volume high value crops under low cost green house	2	Off	28	-	28	1	-	1
Jan 3-4, 08	RY	Commercial Floriculture	2	Off	27	-	27	2	-	2
Feb 14-15, 08	PF	Nutrient Management in Major Field crops	2	Off	24	4	28	10	-	10
Mar 11, 08	RY	Production Technology of Pineapple for commercial cultivation	1	Off	26	-	26	25	-	25
May 29-30, 08	RY	Raising and Management of Citrus Garden with special reference to Orange and Lemon	2	Off	27	-	27	-	-	-
July 18-19, 08	RY	Improve Production Technology of Banana	2	Off	26	-	26	2	-	2
Aug 27-28, 08	RY	Preservation of locally available Fruits and Vegetables	2	Off	-	27	27	-	6	6
Aug 30-31, 08	EF	Organic farming and use of bio-fertilizer in Horticultural crops	2	Off	18	7	25	5	2	7
Sept 4-5, 08	PF	Scientific Production Technology of Winter vegetables	2	Off	20	6	26	5	2	7
Sept 06-07, 08	PF	Production Technology of Potato with special reference to TPS	2	Off	20	7	27	5	2	7
		ANIMAL HUSBANDRY								
Nov 19, 07	RY	Scientific Broiler Production	1	Off	20	5	25	-	-	-

Dec 19, 07	RY	Piggery farming as source of livelihood	1	Off	5	20	25	4	14	18
		SERICULTURE								
Jan 7-9, 08	PF	Rearing of Endi and Muga	3	Off	7	22	29	6	22	28
		FISHERY								
Mar 27-29, 08	RY	Integrated Fish Farming	3	Off	11	16	27	1	-	1
		SOIL SCIENCE								
Nov 21, 07	RY	Vermicomposting	1	Off	27	-	27	10	-	10
Feb 27-28, 08	EF	Soil quality management	2	Off	30	-	30	4	-	4
Mar 12-13, 08	EF	Acid soil management	2	Off	25	-	25	4	-	4
		EXTENSION EDUCATION								
Feb 26, 08	RY	Capacity building	1	Off	25	-	25	-	-	-
		PLANT PROCECTION								
Mar 14-15, 08	PF	Integrated Pest Management in Rice	2	Off	35	-	35	-	-	-
Aug 1, 08	EF	Use of Bio-agents in insect pest and disease management	1	Off	25	-	25	8	-	8
Sept 1-2, 08	EF	Insect pest and disease Management in major Fruit crops	2	Off	26	-	26	9	-	9
Sept 3-4, 08	PF	Integrated pest management in major Rabi vegetable crops	2	Off	26	-	26	7	-	7

# (D) Vocational training programmes for Rural Youth

Cuon /	Identified Thrust		Duration	No.	of Particip	ants	S	elf employed	after training	Number of persons
Crop / Enterprise	Area	Training title*	(days)	Male	Female	Total	Type of units	Number of units	Number of persons employed	Number of persons employed else where
Floriculture	Nursery raising and production of planting materials	Commercial floriculture	2	27	-	27	Nursery	2	6	-
Citrus	Commercial production of Citrus	Raising & management of citrus garden with special reference to orange & lemon	2	27	-	27	Nursery & orchard	6	14	-

# (E) Sponsored Training Programmes

No	Title	Thematic area	Month	Duration (days)	Client PF/RY/EF	No. of courses
1	Seed production technique of Sali rice	Crop production	June	1	PF	1
2	Improved production technology of Potato	Crop production	June	1	PF	1

Tot	al		2	2

				No. of Partic	ipants					
	Male		ı	Female			Tota	al		Sponsoring Agency
Others	SC	ST	Others	SC	ST	Others	SC	ST		
2	-	15	-	-	-	2	-	15	17	D.A.O., Bongaigaon
20	-	5	-	-	-	20	-	5	25	D.A.O., Bongaigaon

# PART – IV (EXTENSION ACTIVITES AND PRODUCTION OF SEED AND PLANTING MATERIALS)

# 5. Extension Activities conducted in the year 2007-08 (including activities under FLD programmes)

National Code of Code of the Author	No. of	F	armers	i	Exter	sion Offi	cials	R	ural Yo	uth		Total	
Nature of Extension Activity	activities	M	F	Т	М	F	T	М	F	Т	М	F	Т
Field Day	5	276	-	276	16	-	16	49	37	86	341	37	378
Kisan Mela													
Kisan Gosthi													
Exhibition													
Film Show													
Method Demonstrations													
Farmers Seminar													
Workshop													
Group meetings													
Lectures delivered as resource persons	22	450	55	505	50	-	50	100	25	125	600	80	680
Newspaper coverage													
Radio talks	3	-	-	-	-	-	-	-	-	-	-	-	-
TV talks													
Popular articles	6												
Extension Literature	2	-	-	-	-	-	-	-	-	-	-	-	-
Advisory Services	21	19	-	19	-	-	-	10	-	10	29	-	29
Scientific visit to farmers field	102	60	-	60	-	-	-	42	-	42	102	-	102
Farmers visit to KVK	207	137	5	142	-	-	-	65	-	65	202	5	207
Diagnostic visits	11	65	-	65	5	-	5	50	-	50	120	-	120
Exposure visits													
Ex-trainees Sammelan													
Soil health Camp													
Animal Health Camp													

Agri mobile clinic													1
Soil test campaigns													1
Farm Science Club Conveners meet													
Self Help Group Conveners meetings													
Mahila Mandals Conveners meetings													1
Celebration of important days (specify)													1
Any Other (Specify)													1
Farmer's scientist interaction	1	16	-	16	-	-	-	12	-	12	28	-	28
Total	386	1023	60	1083	71	-	71	328	62	390	1422	122	1544
M=Male F=Female T=Total													

# Production and Supply of Seeds and Planting Materials (2007-08): NA

### Seed Materials

SI. No.	Crop	Variety	Quantity produced (qtl.)	Value (Rs.)	Quantity supplied (qtl.)	Provided to (No. of Farmers)
Cereals						
Oilseeds						
Pulses						
Vegetables						
Flower Crops						

Others (Specify)			

## Summary: NA

No.	Crop	Quantity produced (qtl.)	Value (Rs.)	Quantity supplied (qtl)	Provided to No. of Farmers
1	Cereals				
2	Oilseeds				
3	Pulses				
4	Vegetables				
5	Flower crops				
6	Others				
	Total				

# Planting Materials None: NA

SI. No.	Crop	Variety	Quantity Provided (Nos.)	Value (Rs.)	Quantity supplied (qtl)	Provided to (No. of Farmers)
Fruits						
Spices						
Vegetables						
	·					

Forest Species				
•				
Ornamental Crops				
Plantation Crops				
Others (specify)	-			

Summary: NA

SI. No.	Crop	Quantity produced (Nos.)	Value (Rs.)	Quantity supplied (qtl)	Provided to No. of Farmers
1	Fruits				
2	Vegetables				
3	Spices				
4	Forest Species				
5	Ornamental Crops				
6	Plantation Crops				
7	Others				
	Total				

Bio-products: NA

SI. No.	Product Name	Species	Quantity	produced	Value (Rs.)	Quantity	Provided to
SI. NO.	Product Name	Species	No	(kg)	value (ns.)	supplied (qti)	(No. of Farmers)
Bioagents							
1							
2							
3							
4							

Biofertilizers				
1				
2				
3				
4				
Bio Pesticides				
1				
2				
3				
4				

Summary: NA

SI. No.	Product Name	Choolee	Qua	ntity	Value (Rs.)	Quantity supplied	Provided to No.
SI. NO.	Si. No. Product Name	Species	No	(kg)	value (ns.)	(qti)	of Farmers
1	Bio Agents						
2	Bio Fertilizers						
3	Bio Pesticide						
	Total						

Livestock: NA

			Qua	ntity		Quantity	
SI. No.	Туре	Breed	Nos	Nos Kgs Value (Rs)	Value (Rs)	supplied (qti)	Provided to (No. of Farmers)
Cattle							
Sheep and Goat							
Poultry							
Fisheries							
Others (Specify)							

Summary: NA

31. No.   Type   Breed   Quantity produced   Value (ns.)   Quantity supplied   Provided to No. of Farmers	SI. No.	Туре	Breed	Quantity produced	Value (Rs.)	Quantity supplied	Provided to No. of Farmers
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		Nos	Kgs		
1	Cattle				
2	Sheep & Goat				
3	Poultry				
4	Fisheries				
5	Others				
	Total				

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

- (A) KVK News Letter ((Date of start, Periodicity, number of copies distributed etc.):Not yet published
- (B) Literature developed/published during 2007-08

Item	Title	Authors name	Number
Research papers	Studies on root growth in maize (Zea mays L.) as influenced by tillage, seed rate and weed control method	Dr. C. K. Sarma	1
Technical reports	1. Annual Report (October, 07 to September, 08)     2. FLD Report on Kharif and Rabi Oilseeds and Pulses,     2007 – 08     3. FLD report of FPARP 2007-08		1
	4.ZREAC report (Kharif & Rabi)		4
			2
			3
News letters			
Technical bulletins	i) Vermicomposting from organic wastes	Dr. C. K. Sarma Dr. S. K. Paul. Dr. K.K.Deka	2
	ii)TPS cultivation	Dr. K.K.Deka	
		Dr. S. K. Paul.	

		Dr. C. K. Sarma	
Popular articles	i) Preparation of vermicompost from organic wastes     ii) Balance fertilization     iii) Bamboo cultivation	Dr. C. K. Sarma	6
	iv) Eco-friendly approaches in agriculture v) Commercial floriculture vi)Seed production technique	Dr. C. K. Sarma Dr. C. K. Sarma Dr. C. K. Sarma	
		Dr. K.K. Deka Dr. S.K. Paul	
Extension literature			
Others (Pl. specify)			
Total			

N.B. Please enclose a copy of each. In case of literature prepared in local language please indicate the title in English

#### (C) Details of Electronic Media Produced during 2007-08: Nil

S. No.	Type of media (CD / VCD / DVD / Audio-Cassette)	Title of the programme	Number

Success stories/Case studies, if any (two or three pages write-up on each case with suitable action photographs)

## A. MR. AMRIT MAHANAYAK, A GRADUTE UNEMPLOYED YOUTH BECOMES AGRICULTURE-ENTREPRENEUR

Krishi Vigyan Kendra, Bongaigaon, four years old organization has been trying sincerely to engage rural youth in income generating activities in the agricultural sector. As a result of its continuous effort, an unemployed graduate youth has paid attention on agriculture for his livelihood and gradually, he has become a successful cultivator.

Mr. Amrit Mahanayak, second son of Mr. Adhir Mahanayak, Vill. Bhetagaon under Bijni sub-division of Chirang district is a dynamic young youth aged around 28 years who completed his graduation in Arts few years back. Mr. Mahanayak, like other youths kept himself busy in searching govt. jobs, but within a short period of time, he realized that it is merely wastage of time and energy and he concentrated in agriculture with his own 2.0ha land. He started cultivating Sali rice followed by potato and vegetables; however, he could not earn much

profit with traditional agricultural practices. He found that the cost of cultivation of rice is very high compared to the return he earned and got upset with the outcome. Fortunately, he came in contact with the scientists of KVK, Bongaigaon and attended a training programme on integrated crop management conducted by KVK, Bongaigaon where he could enrich his knowledge level in respect of modern crop production technologies after interacting with the KVK scientists. Initially, he adopted improved sali rice variety "Ranjit" and followed all the recommended practices of sali rice after consulting KVK scientists. Adoption of scientific method of cultivation made the differences in growth and development compared to earlier traditional practice and finally, resulted in very good yield. He harvested rice yield of 5.4 t/ha which was almost double than the last year. With this encouraging result, he then organized a training programme in his village to know the modern crop production technologies of rabi vegetables and potato. Potato is an important crop of his locality, however, farmers could harvest very low yield (12t/ha) owing to poor adoption of suitable varieties as well as scientific crop management practices. After knowing modern crop management practices, he took necessary initiatives for cultivation of potato crop. KVK, Bongaigaon also started one FLD on irrigation management in Potato under Farmer's Participatory Action Research Programme in an area of 1.0ha during the same season. At the same time, he also started TPS cultivation after taking necessary guidance and help from KVK. He adopted all improved crop management practices with special attention to irrigation scheduling at critical stages of crop growth. Under irrigated condition, he could harvest 408qtl of potato tuber from one ha land area and managed to earn a net profit of Rs. 1, 00,000.00/ha. From TPS plot, he got around 120qtl of sizable tuber which he kept in the cold storage for planting in the next season. Along with potato, he cultivated hybrid variety of chilli with full recommended practices in 0.133ha land area and able to earn a net profit of Rs.15, 000.00 within a short period of time. He is now fully concentrating on commercial agriculture and recently, he has procured a power tiller at a subsidized rate from the department of agriculture. He is now very much grateful to the scientists of KVK, Bongaigaon for rendering excellent services to the farming community as well as to him in particular in the field of agriculture.

Looking at his success, many of the local youths have shown their interest in agriculture, more particularly in potato. Mr. Amrit Mahanayak is now a happy young man with a secured future through agri-entrepreneurship and also become an ideal for many unemployed youth. We the scientists of K.V.K., Bongaigaon are also proud of him and wish him all success.

#### B. MR. PARIMAL MAHAPATRA. A POOR FARMER BECOME A SUCEESFUL AGRI-ENTREPRENEUR.

Mr. Parimal Mahapatra is a middle aged resident of Matiapara village of Bijni sub Division of newly formed Chirang district who took up agriculture as his profession and livelihood few years back. Agriculture and horticulture were the major components of his farming system . Major portion of his area is medium in situation, therefore, he preferred rice cultivation during kharif season as rainfed followed by rabi crops such as toria, tomato, brinjal, cole crops etc. He also cultivated summer vegetables and summer blackgram in some parts of upland area. Although, he got involved with various agricultural activities throughout the year, he could hardly manage to fulfill his family needs from agriculture few years back. Low income from the agricultural activities was the outcome of poor or non adoption of HYVs as well as improved crop management practices which resulted in low crop yield. At that point of time, he was not well aware of HYVs and scientific methods of cultivation and his poor economic condition often debarred him from adopting new technologies. Rainfed farming situation also contributed to lower

crop yield. It was in May, 2005, that a newly formed organization from Kajalgaon " KVK, Bongaigaon" entered into his village for transfer of agricultural technologies and identified Mr. Parimal Mahapatra as one of its beneficiary for FLD programme on HYV of Sali rice (var. Ranjit). He was trained up in the new technologies such as nursery management technique, land preparation, transplanting, fertility management, weed management, pest management etc of Sali rice and provided with all necessary inputs for the programme. With all these practices, he could visualize the effect of improved crop production practices and manage to harvest almost double yield (5.4 t/ha) compared to previous year. Being inspired by the result of FLD, he became interested to adopt improved crop management practices in vegetable crops also and participated in the training programmes of KVK, Bongaigaon. He collected necessary informations in respect of HYVs of vegetable crops along with their cultivation technology and started cultivation of vegetable crops. He also adopted hybrid varieties of tomato and chilli in consultation with KVK scientist in an area of 0.065ha initially during 2005. After receiving encouraging result, he expanded his vegetable growing area from 2006 onward and got net profit of Rs. 10,000.00. Simultaneously, he paid his attention to other field crops also. He used to cultivate mainly black gram, toria and lentil with locally available varieties which were low yielder without using any scientific technologies. During 2006-07, some HYVs namely "Part U 19", "TS-36" and "B-77" of black gram, toria and lentil, respectively were introduced in his crop field along with their crop management practices through FLD programmes. With the introduction of new technologies, he could harness more profit and gradually expanded his area to 1.5ha for toria and to 0.5 ha for lentil and black gram. He, later on installed irrigation facility in his crop field with the assistance of state dept. of agriculture to provide life saving irri

#### Give details of innovative methodology or innovative technology of Transfer of Technology developed and used during the year

- 1. Publication of articles in the news paper on agricultural technologies.
- 2. Use of media to share experiences of farmers on FLD, OFT and training programmes
- 3. Discussion with the farmers at Farm Science Club at least once in a month
- 4. Making literatures on recent technologies available at Farm Science Club
- 5. Conducting FLDs under Farmer's Participatory Action Research Programme
- 6. Organizing farmers scientist interaction programme

#### Give details of indigenous technology practiced by the farmers in the KVK operational area which can be considered for technology development (in detail with suitable photographs)

S. No.	Crop / Enterprise	ITK Practiced	Purpose of ITK
1.	Rice	Use of perches in the paddy field so that predatory birds sit on it and can trap insect pests.	Control insect pests.
2.	Paddy	Application of some weeds and outer coat of citrus fruit in the standing water of paddy field to control case worm.	Control case worm
3.	Paddy	Use of dead frog and crab in the paddy field to repel	Repel Gandhi bug

		Gandhi bug.	
4.	Paddy	Spraying of fresh cow dung solution in paddy crop to control bacterial leaf blight.	Control bacterial leaf blight.
5.	Paddy	Application of kerosene oil in the standing water of paddy field to control case worm infestation.	Control case worm infestation.
6.	Brinjal	Application of ashes over the leaves of some cucurbits and brinjal to reduce insect infestation.	Reduce insect infestation.
7.	Bottle gourd	Splitting of base of bottle gourd plant and piercing with catfish spine to induce fruit setting.	Induce fruit setting.
8.	Vegetable crops	Spraying of solution of one part of cattle urine and six part of water in vegetable crops to protect against insect pests.	Protect against insect pests.
9.	Seed preservation	Use of neem leaves for controlling storage pests.	Controlling storage pests.

#### Indicate the specific training need analysis tools/methodology followed for

- ♦ Identification of courses for farmers / farm women
- a) Need based training courses are being identified after collecting necessary informations from the farmer's field in a participatory way.
- b) Some training courses are identified after interacting with the extension functionaries of various departments and members of NGOs as well as farmer's organizations.
- c) Training courses are also decided considering farmer's demand on a particular subject matter.
- ♦ Rural Youth
- a) Need based training courses are identified after interacting with youth organizations, SHGs NGOs, Govt. Depts. etc.
- b) Vocational training courses are planned after knowing scope and prospects of income generating activities in the rural areas.
- c) Through people's participation.
- ♦ In-service personnel
- a) Interaction with the extension functionaries of agriculture and allied departments, NGOs, SHGs etc.
- b) Based on the discussion in ZREAC meeting and on latest technological development.

#### Field activities

i. Number of villages adopted: 2
ii. No. of farm families selected: 20
iii. No. of survey/PRA conducted: 2

Activities of Soil and Water Testing Laboratory: Nil (Not yet established)

SI. No	Name of the Equipment	Qty.	Cost
1			
2			
3			
	Total		

## Details of samples analyzed so far : NA

Details	No. of Samples	No. of Farmers	No. of Villages	Amount realized
Soil Samples				
Water Samples				
Total				

# PART – V (IMPACT OF KVK ACTIVITIES)

# 6. Impact of KVK activities (Not to be restricted for reporting period).

Name of specific technology/skill	No. of	% of adoption	Change in inc	come (Rs.)
transferred	participants		Before (Rs./Unit)	After (Rs./Unit)
Early flowering of citrus var.     Assam Lemon through root     exposure, irrigation, balance     fertilization followed by black	25	60	90,000.00/ha	1,50,000.00/ha

polythine mulching				
2. Commercial cultivation of Banana, Var. Malbhog through 'corm' as planting material along with recommended doses of fertilizer, treatment of planting material and all plant protection measures	100	45	52,000.00/ha	87,500.00/ha
Selection of suitable variety of Potato, seed treatment, balance fertilization, irrigation and plant protection measures for late blight and wilt	50	40	48,000.00/ha	94,000.00/ha
4. Nursery management techniques for high yielding variety of Boro rice	25	40	23,500.00/ha	28,000.00/ha
5. Introduction of HYV of Sali rice var. Ranjit with modern cultivation technology v.z. time of sowing & transplanting, seed treatment, water management and use of fertilizers	50	50	21,600.00/ha	34,200.00/ha

NB: Should be based on actual study, questionnaire/group discussion etc. with ex-participants.

# Cases of large scale adoption (Please furnish detailed information for each case below)

- 1. Mr. Dinesh Roy, a farmer of Tengabari village under Kajalgaon sub-division, had started large scale banana plantation var. Malbhog in 20ha land during 2006-07 using 'corm' as standard planting material after recieving necessary guidance and helps from KVK, Bongaigaon. He has organized the farmers of the locality and formed a group named "Banana Farmers Committee" comprising 17 farm families of village 'Tengabari', Kajalgaon and has started planting of Banana var. Malbhog with the adoption of scientific cultivation technology.
- 2. Large scale adoption of citrus, Var. Assam Lemon through scientific methods of planting, irrigation, balance fertilization with necessary plant protection measures in 4.0ha and 3.5ha land by Mr. Sarat Basumatary and Mr. Promod Basumatary, respectivelys.
- 3. Boro rice is cultivated in some areas of the district with some intruded varieties like BR-8, BR-9 etc which yield 4.0-4.5 t/ha. KVK, Bongaigaon conducted a FLD programme on HYV of boro rice "Joymati" in an area of 3.0 ha during 2005-06 and 2006-07. After visualizing the performance of variety "Joymati", many farmers became interested to replace existing varieties with Joymati and the area under Joymati has gone up to 40.0 ha.
- 4. Potato is an important vegetable crop of the district and necessary extension activities required for obtaining higher yield has been initiated. Mr. Amrit Mahanayak, a graduate rural youth had adopted scientific cultivation practices of potato after receiving necessary helps and guidance from the scientist of KVK, Bongaigaon and could harvest 408 qtl/ha under irrigated condition. With this encouraging result, many farmers become interested to grow potato crop with improved management practices and necessary initiatives have been started for early crop.

## Details of impact analysis of KVK activities carried out during the reporting period (Give below)

SI.	Name of the specific technical skill transferred	No. of	% adoption	Charges in income	
No.		participants		Before (Rs./Unit)	After (Rs./Unit)
1.	Irrigation management in potato (Application of 4 cm	27	25	25.000.00/ha	1.00.000.00/ha

	irrigation water at stolonization, tuberization and tuber development stage)				
2.	Selection of HYV of Boro rice, nursery management techniques and modern methods of production	27	40	20,500/ha	30,000/ha
3.	Introduction of HYV of Sali rice var. Ranjit with modern cultivation technology like timely planting, seed treatment, water management and use of balance fertilizer	62	55	20,600/ha	25,000.00

# PART – VI (LINKAGES WITH OUTSIDE ORGANISATIONS)

# 7. Functional linkage with different organizations

Name of organization		Nature of linkage
State Department of	i.	Identification of training needs and target group for various extension activities.
Agriculture, Veterinary	ii.	Involvement in various state extension activities like Technology Mission, District Level Implementation and
Science, Fishery, and		Monitoring etc.
Sericulture etc. of	iii.	Planning and implementation of ATMA.

Bongaigaon and Chirang district.	iv.	Exchange of resource persons in various training programmes
<ol><li>Civil Administration,</li></ol>	i.	Participation in departmental programmes.
DRDA, SIRD, Block	ii.	Formation and functioning of SHGs, NGOs etc.
Development Offices,	iii.	Entrepreneurship development.
Banks of Bongaigaon and		
Chirang district.		
3.Farmer's Organizations	i.	Identification of need based training courses and beneficiaries for various extension activities.
like Field Management	ii.	Organizing training programmes.
Committee, All Bodoland	iii.	Entrepreneurship development.
Farmer's Association		
(DuBAA), Jack Fruit		
Grower Society, Anjali		
Sukhati etc.		
4.Non Govt. Organizations	i.	Identification of training courses and target groups.
like Madhuchakra	ii.	Organizing training programmes.
Development Organization,	iii.	Participation as resource person in collaborative programmes.
Basugaon, Discovery Club,		
Bongaigaon, Asomi,		
Abhayapuri & Bongaigaon		
branch etc.		
5.Indian Institution of	i.	Participation in training programmes.
Technology, Guwahati,	ii.	Identification of beneficiaries.
Indian Institution of	iii.	Involvement in the district level planning programmes for entrepreneurship development.
Entrepreneurship,		
Guwahati and Institute of		
Co-operative		
Management-Guwahati		
6.Research Stations and	i.	Participation in ZREAC meeting.
KVKs of Assam	ii.	Invitation of resource persons.
Agricultural University	iii.	Supply of seed materials for FLD and OFT programmes.
7.All India Radio, Kokrajhar	i.	Publicity
ND. The material of Enterior shows	ii.	Radio talk.

NB The nature of linkage should be indicated in terms of joint diagnostic survey, joint implementation, and participation in meeting, contribution received for infrastructural development, conducting training programmes and demonstration or any other

List special programmes undertaken by the KVK, which have been financed by State Govt./Other Agencies: Nil

Name of the scheme	Date/ Month of initiation	Funding agency	Amount (Rs.)

### Details of linkage with ATMA

Is ATMA implemented in your district Yes/No: Yes

No.	Programme	Nature of linkage	Remarks
1.	Training	Involvement in the training programmes as resource person and as participants.	Preparations of SREP report for one district & DADS for two districts were completed.
2.	Survey	Conducted survey as a member of AES team	
3.	Preparation of SREP &DADS	Providing technical guidance for preparation of SREP & DADS	

### Give details of programmes implemented under National Horticultural Mission

No.	Programme	Nature of linkage	Constraints if any
1.	Technology Mission	Providing technical guidance	-
		Monitoring of farmers field	
		Participated as resource person in the training	
		programme	

### Nature of linkage with National Fisheries Development Board

No.	Programme	Nature of linkage	Remarks
1.	Training	Organizing training & selection of beneficiaries.	Proposal for training have been submitted to NFDB for necessary approval

# PART – VII (PERFORMANCE OF INFRASTRUCTURE IN KVK)

## 8. Performance of infrastructure in KVK: Nil

Utilization of demonstration units (other than instructional farm): Nil

						Pro	duction		Ar	mount (Rs.)
No.	Demo Unit	Year of estt.	Area	Variety	Produce	Qty.	Cost of inputs	Gross income expected		

Utilization of instructional farm (Crops) including seed production: Nil

Name			8.0		Production		Amoun	t (Rs.)
Of the crop	Date of sowing	Date of harvest	Area (ha)	Variety	Type of Produce	Qty.	Cost of inputs	Gross income
Cereals								
Pulses								
Oilseeds								
Oliseeus								
Fibers								
Spices								
Plantation crops								
Floriculture								
Fruits								
Vegetables								
Others (Specify)								

Production Units (bio-agents / bio pesticides/ bio fertilizers etc.): Nil

			Amount (Rs.)		
No.	Name of the Product	Qty	Cost of inputs	Gross income expected	

Performance of instructional farm (livestock and fisheries production): Nil

No	Name	Details of production
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of th	ne animal / bird / aquatics	Breed	Type of Produce	Qty produced

Utilization of hostel facilities: Nil

Accommodation available (No. of beds): NA

Months	No. of trainees stayed	Trainee days (days stayed)	Reason for short fall (if any)
September 2007			
October			
November			
December			
January 2008			
February			
March			
April			
May			
June			
July		_	
August			

(for whole of the year)

# PART – VIII (FINANCIAL PERFORMANCE)

## 9. Details of KVK Bank accounts

	Bank account	Name of the bank	Location	Account Number
W	/ith Host Institute	-	-	-
W	/ith KVK	State Bank of India	BRPL Complex	AAU Gen. Fund a/c No.
		State Barnt of Iridia	Dhaligaon	10266315899

Utilization of funds under FLD on Oilseed (Rs. In Lakhs)

	Released by ICAR		Expenditure			
Item	Kharif	Rabi	Kharif	Rabi	Unspent balance as on 1 <sup>st</sup> April 2008	
	2007	2007 -08	2007	2007-08		
Inputs	9500.00	11,166.00	9335.00	11,166.00	165.00	
Extension activities	588.00	=	500.00	-	88.00	
TA/DA/POL etc.	1787.00	649.00	1581.00	584.00	266.00	
Total	11875.00	=	11416.00	-	519.00	

### Utilization of funds under FLD on Pulses (Rs. In Lakhs)

	Released by ICAR		Expenditure		
Item	Kharif 2007	Rabi 2007 -08	Kharif 2007	Rabi 2007-08	Unspent balance as on 1 <sup>st</sup> April 2008
Inputs	11468.75	9,352.00	11425.00	8,000.00	1,395.75
Extension activities	-	1,247.00	=	500.00	747.00
TA/DA/POL etc.	1000.00	1,860.00	930.00	370.00	1,569.00
TOTAL	12468.75	12,468.00	12355.00	8,870.00	3,711.75

# Utilization of KVK funds during the year 2007-08 and 2008-09 (Upto Sep. 2008) (year-wise separately) (current year and previous year) Year: 2007-08

No.	Particulars	Sanctioned	Released	Expenditure			
A. Re	A. Recurring Contingencies						
1	Pay & Allowances	23,50,000.00		19,82,471.00			
2	Traveling allowances	1,00,000.00		94,719.00			
3	Contingencies						
Α	Stationery, telephone, postage and other expenditure on office						
	running, publication of Newsletter and library maintenance						
	(Purchase of News Paper & Magazines)	1,00,000.00					
В	POL, repair of vehicles, tractor and equipments						
С	Meals/refreshment for trainees (Ceiling up to Rs.40/day/trainee be						
	maintained)	4,00,000.00		2,63,276.00			
D	Training material (posters, charts, demonstration material including						
	chemicals etc. required for conducting the training)						
Е	Frontline demonstration except oilseeds and pulses (minimum of						
	30 demonstration in a year)						

F	On farm testing (on need based, location specific and newly generated information in the major production systems of the area)		
G	Training of extension functionaries		
Н	Maintenance of buildings		
- 1	Establishment of Soil, Plant & Water Testing Laboratory		
J	Library		
	TOTAL (A)	29,50,000.00	

B. No	B. Non-Recurring Contingencies				
1	Works	15,49,000.00			
2	Equipments including SWTL & Furniture	-			
3	Vehicle (Four wheeler/Two wheeler, please specify)	-			
4	Library (Purchase of assets like books & journals)	_			
	TOTAL (B)	15,49,000.00			
C. RI	EVOLVING FUND	-			
	GRAND TOTAL (A+B+C)	44,99,000.00			

Year: 2008-09 ( up to September,08)

No.	Particulars	Sanctioned	Released	Expenditure
A. Re	curring Contingencies			
1	Pay & Allowances	24,00,000.00		8,12,304.00
2	Traveling allowances	75,000.00		13,075.00
3	Contingencies			
А	Stationery, telephone, postage and other expenditure on office running, publication of Newsletter and library maintenance (Purchase of News Paper & Magazines)	80,000.00		
В	POL, repair of vehicles, tractor and equipments			
С	Meals/refreshment for trainees (Ceiling up to Rs.40/day/trainee be maintained)	3,20,000.00		79,188.00
D	Training material (posters, charts, demonstration material including chemicals etc. required for conducting the training)			
E	Frontline demonstration except oilseeds and pulses (minimum of 30 demonstration in a year)			

F	On farm testing (on need based, location specific and newly		
	generated information in the major production systems of the area)		
G	Training of extension functionaries		
Н	Maintenance of buildings		
1	Establishment of Soil, Plant & Water Testing Laboratory		
٦	Library		
	TOTAL (A)	28,75,000.00	904567.00

B. No	B. Non-Recurring Contingencies				
1	Works	-			
2	Equipments including SWTL & Furniture	-			
3	Vehicle (Four wheeler/Two wheeler, please specify)	-			
4	Library (Purchase of assets like books & journals)	-			
	TOTAL (B)	-			
C. RE	EVOLVING FUND	_			
	GRAND TOTAL (A+B+C)	28,75,000.00			

### Status of revolving fund (Rs. in lakhs) for the three years: NA

Year	Opening balance as on 1 <sup>st</sup> April	Income during the year	Expenditure during the year	Net balance in hand as on 1 <sup>st</sup> April of each year
April 2005 to March 2006				
April 2006 to March 2007				
April 2007 to March 2008				

Please include information which has not been reflected above (write in detail).

#### Constraints

#### (a) Administrative

- Shortage of Subject Matter Specialists and Programme Assistant creates problems in proper implementation of the programmes
   Frequent bandh called by various organizations often disturbs functioning of KVK

3. Lack of permanent office building and other infrastructure facilities hinders smooth functioning of KVK activities

#### (b) Financial

- 1. Lack of modern instructional aids like LCD Projector, TV, DVD etc. often effects smooth conduct of various extensionactivities
- 2. Lack of internet facility for quick dissemination of information's and updating of knowledge base
- 3. Poor technical backup

#### (c) Technical

- 1. Procedure for release of fund for various activities is time consuming and delays smooth conduct of the programme
- 2. Allocation of fund for trainee's meal is not sufficient

# PART – IX (SUMMARY OF SCIENTIFIC ACHIEVEMENTS)

## **Technology Assessment and Refinement**

#### Details of technologies assessed

Technologies Assessed				
Crop/ Enterprise	Name of the technology			
	Scented rice varieties with recommended package of practices			
	i) Ketekijoha			
Rice	ii) Bakuljoha			
	Boro rice varieties with recommended package of practices			
	i) NBR-2			

	ii) NBR-3
Black gram	Application of manure and fertilizer @ FYM 4.5t ha <sup>-1</sup> and 15:35:0 kg ha <sup>-1</sup> of N: P <sub>2</sub> O <sub>5</sub> :
Diack grain	$K_2O + lime 5.0 q ha^{-1}$
Toria	Recommended package of practices of toria with 33% higher seed rate i.e. 13.3 kg ha
Tomato	Seed , seedling and soil treatment with Biofor-PF for controlling tomato wilt

## Details of technologies refined: Nil

Technologies Refined				
Crop/ Enterprise	Name of the technology			

#### Abstract on the number of technologies assessed in respect of crops

Thematic areas	Cereals	Oilseeds	Pulses	Commercial Crops	Vegetables	Fruits	Flower	Plantation crops	Tuber Crops	Total
Varietal Evaluation	1									
Seed / Plant production										1
Weed Management										1
Integrated Crop Management		1								1
Integrated Nutrient Management			1							1
Integrated Farming System										
Mushroom cultivation										
Drudgery reduction										1
Farm machineries										1
Value addition										1
Integrated Pest Management										1
Integrated Disease Management					1					1
Resource conservation technology										
Small Scale income generating enterprises										
Total										

# Abstract on the number of technologies refined in respect of crops: Nil

Thematic areas	Cereals	Oilseeds	Pulses	Commercial Crops	Vegetables	Fruits	Flower	Plantation crops	Tuber Crops	Total
Varietal Evaluation										
Seed / Plant production										1
Weed Management										

Integrated Crop Management					
Integrated Nutrient Management					
Integrated Farming System					
Mushroom cultivation					
Drudgery reduction					
Farm machineries					
Post Harvest Technology					
Integrated Pest Management					
Integrated Disease Management					
Resource conservation technology					
Small Scale income generating enterprises					
Total				_	

Abstract on the number of technologies assessed in respect of livestock enterprises: Nil

Thematic areas	Cattle	Poultry	Piggery	Rabbitary	Fisheries	Total
Evaluation of Breeds						
Nutrition Management						
Disease of Management						
Value Addition						
Production and Management						
Feed and Fodder						
Small Scale income generating enterprises						
Total						

Abstract on the number of technologies refined in respect of livestock enterprises: Nil

Thematic areas	Cattle	Poultry	Piggery	Rabbitary	Fisheries	Total
Evaluation of Breeds						
Nutrition Management						
Disease of Management						
Value Addition						
Production and Management						
Feed and Fodder						
Small Scale income generating enterprises						
Total						

# Performance of important technologies

Performance of technology assessment

Note: Please provide information on the most successful cases of technology assessment done by your KVK (if any) in the format given below. (Based on data already given on OFTs)

1. Name of technology: Scented rice varieties "Ketekijoha" and "Bakuljoha" with recommended package of practices

	No. of Performance on different parameters							Acceptability in existing	
Name of KVK	OFT Title	OFTs	Parameter	Performance of Farmer's practice	Performance of previous technology	Performance of newly assessed technology	Farmers reaction	farming system	
KVK , Bongaigaon	Performance of scented rice varieties in the farmers field	7	1 Grain yield ( kg/ha) 2 3 4	2400	-	Ketekijoha - 2920 Bakuljoha - 2730	i)Very good high yielding scented rice varieties having very high aroma ii) May replace local varieties iii)Supply of quality seed	Farmers use to cultivate some local varieties of scented rice having lower yield potential and similar crop duration. These varieties may be replaced by scented rice varieties "Ketekijoha" and "Bakuljoha" and may fit well to the existing	
							need to be ensured	cropping system.	

2. Name of technology: Recommended package of practices of toria with 33% higher seed rate under late sown condition

		No. of		Performa	's	Farmers	Acceptability in existing	
Name of KVK	OFT Title	OFTs	Parameter	Performance of Farmer's practice	Performance of previous technology	Performance of newly assessed technology	reaction	farming system
			1 Crop yield ( kg/ha)	525	-	675	i)Technology may be adopted	Sowing of toria is more often delayed in the
			2				in the farmer's	farmer's field due to
	Performance of late	3	3				field under late	cultivation of long duration
KVK ,	sown toria ( Var. TS-		4				sown condition	Sali rice varieties which
Bongaigaon	36) grown after Sali						ii) Irrigation in	results in poor crop stand.
	paddy						the later stages	Under such condition, this
		5				may further	technology will have much	
						enhance crop	acceptability in the existing	
							yield	cropping systems.

Add the same table again for details on more technologies (if any)

Performance of technology refinement: NA

Note: Please provide information on the most successful cases of technology refinement done by your KVK (if any) in the format given below. (Based on data already given on OFTs)

1. Name of technology:

		No. of		Performa	nce on different parameter	rs	Farmers	Acceptability in existing
Name of KVK	OFT Title	OFTs	Refined Parameter	Performance of Farmer's practice	Performance of assessed technology	Performance of technology after refinement	reaction	farming system
			1					
			2					

		3			
	4				
		5			

Add the same table again for details on more technologies (if any)

# **Frontline Demonstrations**

Crops	No. of demonstrations	Area (ha)
Oilseeds	28	12.0
Pulses	27	10.0
Cereals	3	2.0
Millets		
Cash crops		
Fodder crops		
Fruit crops		
Vegetable crops	7	1.4
Plantation crops		
Spices and condiments		
Flowers and ornamental crops		
Medicinal and aromatic plants		
Fishery		
Total	65	25.4

Enterprises	No. of demonstrations	Units (No.)
Dairy		
Sheep and goat		
Poultry		
Piggery		
Rabbitary		
Apiculture		
Mushroom units		
Total		
Grand total	65	25.4

Signature,
Programme Coordinator,
KVK, Bongaigaon

(Signature not needed in case of soft copy)

#### Note:

The filled in Proforma has to be emailed to <code>icar\_zcu3@yahoo.co.in</code> on or before <code>15th</code> September, <code>2008</code>. Also the typed proforma (3 copies) has to be submitted along with soft copy in a CD along with photographs at the Annual Zonal Workshop of KVKs to be held at Itanagar, Arunachal Pradesh during September 2008. The reports will be verified on the spot before submission. Incomplete and casually filled reports not complying with the given guidelines will not be accepted. Hence KVKs are requested to take utmost care in filling up the proforma in line with the guidelines provided at the beginning.

#### Materials to be submitted at Annual Zonal Workshop of KVKs:

- 1. 3 hard copies of Annual Report 2007-08
- 2. 3 hard copies of Annual Action Plan 2008-09
- 3. One CD containing 3 separate folders namely Annual Action Plan 2008-09, Annual Report 2007-08 and Action Photographs.

  (The folder on action photographs should contain 10 action photos in JPEG format. The photos should be as separate JPEG files and not to be pasted in a single Word file. The name of each JPEG file should indicate the activity in Photograph in detail.)