# **ANNUAL REPORT 2013-14**

(FOR THE PERIOD APRIL 2013 TO MARCH 2014)

KRISHI VIGYAN KENDRA (TUMKUR)

### PART I - GENERAL INFORMATION ABOUT THE KVK

1.1. Name and address of KVK with phone, fax and e-mail

KVK Addrass	Telephone		E mail	Web Address	
KVK Address	Office	Fax	E mail	Web Address	
KVK, Konehalli, Tiptur ,Tumkur	08134-294771		kvktumkur@gmail.com		

1.2 .Name and address of host organization with phone, fax and e-mail

Adduses	Telephone		E	Wob Address	
Address	Office	Fax	E mail	Web Address	
University of Agricultural Sciences, GKVK Bangalore	080-23332442 09449866900	080-23332442	vc@uasbangalore.edu.in	www.uasbangalore.edu.in	

1.3. Name of the Programme Coordinator with phone & mobile No

Nome	_	/ Contact	
Name	Residence	Mobile	Email
Dr.G.M.Sujith		9449866936 kvktumkur@gmail.com	

### 1.4. Year of sanction: 2004

# 1.5. Staff Position (as on 31st March 2014)

Sl. No.	Sanctioned post	Name of the incumbent	Designation	M/F	Discipline	Highest Qualification	Pay Scale	Basic pay	Date of joining KVK	Permanent /Temporary	Category
1	Programme Coordinator	Dr. G.M. Sujith.	Programme Coordinator	M	Agronomy	Ph.D (Agron)	15600-39100	26590	1-Oct-12	Permanent	GM
2	SMS	Mr. Nagappa Desai	SMS	M	Horticulture	M.Sc(Agri.)in Hort.	15600-39100	24320	17-Jul-09	Permanent	GM
3	SMS	Dr. K.R. Shreenivasa	SMS	M	Plant Protection	Ph.D (Plant pathology)	15600-39100	24320	10-Oct-13	Permanent	GM
4	SMS	Mr. M.H.Shankara	SMS	M	Ag Extn.	M.Sc (Ag. Extn.)	15600-39100	22920	26-Oct-11	Permanent	GM
5	SMS	Dr. B. Mamatha	SMS	F	Soil Science & Agril. Chemistry (SS &AC)	Ph.D .(SS&AC)	15600-39100	22250	17-Nov-12	Permanent	GM
6	SMS	Ms. Roopa B Patil	SMS	F	Home Science	MHSc (F &N)	15600-39100	21600	11-Oct-13	Permanent	GM
7	SMS	Dr. H.B. Shivappa Nayaka	SMS	M	Animal Science	M.V.Sc (Poultry Science)	15600-39100	21600	24-10-13	Permanent	ST
8	Programme Assistant (Trg. Asst.)/T-4	Ms. Arjuman Banu	Trg. Asst. / T-4	F	-	MBA (ABM)	9300-34800	14760	10-Dec-13	Permanent	GM
9	Programme Assistant (Computer)/ T-4	Mr. H. Pradeep Kumar	Prog. Asst (Comp.)/ T-4	M	-	BE (CSE)	9300-34800	13500	22-Jan-11	Permanent	SC
10	Programme Assistant/ Farm Manager	Vacant	Farm Manager	-	-		-	-	-	-	-
11	Assistant	Mrs. K.B. Accamma	Assistant	F	-	M. Com, BLISC	16000-29600	16000	24-Jul-13	Permanent	GM
12	Jr. Stenographer	Vacant	Jr. Stenographer	-	-	-	-	-	-	-	-
13	Driver	Mr. S. Lokesh	Driver (LV)	M	-	SSLC	11600-21000	11800	25-Aug-12	Permanent	GM
14	Driver	Mr. B. Mallikarjunaiah	Tractor Driver	M	-	SSLC	14550-26700	16400	18-Feb-10	Permanent	GM
15	Supporting staff	Mr. L. Manjaiah	Cook/care taker	M	-	SSLC	10400-16400	11400	20-Oct-08	Permanent	SC
16	Supporting staff	Mr. M.S.Manjunatha	Attender	M	-	SSLC	9600-14500	11600	3-May-11	Permanent	GM

### 1.6. Total land with KVK (in ha): 23 ha

S. No.	Particulars Particulars	Area (ha)
1	Under Buildings	03
2.	Under Demonstration Units	
3.	Under Crops	20
4.	Orchard/Agro-forestry	-
5.	Others	-

### 1.7. Infrastructural Development:

A) Buildings

	, 3	Source of			Stage	e		
S.	Name of building	funding	Complete			Incomplete		
No.	Name of building		Completion	Plinth area	Expenditure (Rs.)	Starting Date	Plinth area	Status of
			Date	Date (Sq.m)	Expenditure (Ks.)	Starting Date	(Sq.m)	construction
1.	Administrative	ICAR UAS	22.02.2012		55,00,000			
	Building	ICAR UAS	22.02.2012	_	25,00,000	-	-	-
2.	Farmers Hostel	ICAR	22.12.2012	550	53,00,000	-	-	-
3.	Staff Quarters	=	=	-	-	-	-	-
4.	Demonstration Units	=	=	-	-	-	-	-
5	Fencing	=	=	-	-	-	-	
6	Rain Water harvesting system	-	-	-	-		-	-
7	Threshing floor	-	-	-	-	-	-	-
8	Farm godown	-	-	-	-	-	-	-

### B) Vehicles

Type of vehicle	Year of purchase	Cost (Rs.)	Total kms. Run	Present status
Jeep Mahindra BOLERO	2004	5,00,000	230862	Good
Tractor Massey Ferguson	2002	3,80,000	3184.2 (hours)	Good
Bike TVS Star City	2006	40,000	27057	Good
TVS VICTOR(UAS Vehicle)	2003	50,000	38146	Good
Honda Activa	2009	50,000	27212	Good

### C) Equipments & AV aids

Sl. No.	Name of Equipments	Year of purchase	Cost (Rs.)	Present status
1	Photo Copier (Toshiba)	30-03-2009	77,954	Good
2	Generator (10 KV)	01-04-2002	86,100	Good
3	Over Head Projector (OHP)	28-05-2002	15,976	Good
4	Camera Pentax –SLR	31-07-2002	25,000	Good
5	Public Address System	31-07-2002	21,500	Good
6	Kodak Ektalite Slide Projector with slide tray	05-04-2003	47,125	Good
7	Philips TV 21 inches + VGuard Stabilizer	20-05-2003	12,513 + 882	Good
8	Philips DVD Player 625 K	20-05-2003	8,276	Good
9	LYNX Stevenson Screen Single	04-07-2003	6,000	Good
10	Trolley Stand	05-04-2003	7,655	Good
11	Bee hive boxes (12 nos.)	06-01-2003	7,800	Good
12	Nova easy carry display system (1 set)	06-01-2003	14,000	Good
13	Nova cardinal writing board (3' x 4')	05-04-2003	5,742	Good
14	HP Deskjet 3745 Printer	12-03-2005	3,400	Good
15	HP Scanjet 2400 Scanner	12-03-2005	4,400	Not working
16	Thoshiba Projector	14-06-2007	60,106	Good
17	Honda weed cutter	17-02-2009	30,000	Good
18	Panasonic fax machine	21-01-2011		Good
19	HP Lasejet 1020plus printer	28-02-2012	7,350	Good
20	Computer (Intel Pentium)	21-01-2013		Good
21	CANON Laser printer	21-01-2013		Good
22	Digital Sony camera MDSEW 320	21-01-2013		Good
23	Acer desktop computer	28-02-2013	32,150	Good
24	DSC coolpix S 6300 NIKON digital camera	07-03-2013	10,490	Good
25	NIKON coolpix P530 camera	13-03-2013	19,991	Good

# 1.8. Details SAC meeting conducted in 2013-14

Sl.No.	Date	Number of Participants	No. of absentees	Salient Recommendations	Action taken
1.	-	-	-	-	-

### **PART II - DETAILS OF DISTRICT**

### 2.1 Major farming systems/enterprises (based on the analysis made by the KVK)

S. No	Farming system/enterprise
1	Finger millet, Paddy, Ground nut, Redgram, Coconut, Vegetables, Arecanut, Dairying, Sericulture

### 2.2 Description of Agro-climatic Zone & major agro ecological situations (based on soil and topography)

Sl. No	Agro-climatic Zone	Characteristics
	Central Dry Zone (Zone - 4)	Red sandy soil mixed with clay soil and patches of black soil
1	Madhugiri, Pavagada, Sira, Koratagere, Tiptur and C.N.	Average rain fall 606.81 mm
	Halli taluks	Source of irrigation are small tanks & borewells
Ea	Fostown Dwy Zone (Zone 5)	Red clay loam and clay lateritic soil
2	Eastern Dry Zone (Zone -5) Tumkur and Gubbi taluk	Average rainfall 768.16 mm
		Source of irrigation are tanks, wells and borewells
	Southorn Dwy Zono (Zono 6)	Red sandy soil mixed with clay soil.
3	Southern Dry Zone (Zone-6) Kunigal and Turvekere taluk	Average rainfall 750.56
		Source of irrigation are small tanks and borewells

S. No	Agro ecological situation	Characteristics
1	Agro eco sub region-1	Hot moist, semiarid with LGP 150-180 days (LGP-length of growing period)

### 2.3 Soil types

S. No	Soil type	Characteristics	Area (ha)
1	Red sandy loam	Soil contains 75-80% sand, silt 5-15% and clay 16-20%. Depth of the soil is shallow to medium.  The clay fraction of red soils is rich in kaolinitic type of clay minerals, medium in fertility	6, 15,230
2	Shallow black soils	Depth of the soil is shallow, water holding capacity is poor, low fertility	2, 45,432
3	Red loamy soils	Red loams characterized by argillaceous soils with a cloddy structure and the presence of only a little concretionary material. Soils contain 31 – 34 % sand and 44 to 47% silt and 22 to 25 % clay, medium to high fertility. "N" is below 0.1 percent	2, 04,093

2.4. Area, Production and Productivity of major crops cultivated in the district

S. No	Crop	Area (ha)	Production (Qtl)	Productivity (Qtl/ha)
1	Rice	10578	38892	3677
2	Jowar	2225	1176	528
3	Finger millet	175024	232364	1328
4	Maize	24987	59542	2383
5	Minor Millets	3428	1381	403
6	Redgram	13317	5020	377
7	Black gram	1047	132	126
8	Horsegram	11713	3290	281
9	Field bean	9754	2636	270
10	Greengram	11131	1824	164
11	Cowpea	4124	1263	306
12	Groundnut	84237	35827	425
13	Sesamum	345	57	164
14	Sunflower	736	788	1071
15	Castor	2290	780	340
16	Niger	1377	233	169
17	Mustard	706	109	155
18	Cotton	695	3607	5
19	Sugarcane	646	54884	85

(Source: Dept of Agriculture, Tumkur)

### 2.5. Weather data

N/I 41-	D - 'f-11 ()	Temp	D-1-4 H	
Month	Rainfall (mm)	Maximum	Minimum	Relative Humidity (%)
April 2013	38.0	26.96	20.68	88.41
May 2013	10.0	26.50	19.54	87.31
June 2013	8.0	25.60	18.56	88.34
July 2013	65.0	26.32	19.54	90.54
August 2013	87.0	26.61	19.73	91.60
September 2013	306.0	28.17	19.59	93.83
October 2013	12.0	28.77	19.64	93.78
November 2013	5.0	26.55	18.34	92.78
December 2013	9.5	28.43	13.36	87.02
January 2014	9.5	28.53	14.36	87.42
February 2014	0.0	31.19	16.98	78.72
March 2014	0.0	33.33	18.63	73.33

(Source: Dept of Agriculture, Tumkur)

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

Category	Population	Production	Productivity
Cattle	-	•	
Crossbred	63704	54	5.5745
Indigenous	440888	56	2.0671
Buffalo	217528	68	2.5382
Sheep meat 000 tor	ns		
Crossbred	9		
Indigenous	884643	17.31	
Goats	322373	16.60	
Pigs	-	-	-
Crossbred	905	0.23	
Indigenous	12411		
Rabbits	560	NA	
Poultry egg pro	duction in lakhs		
Hens			
Desi	6,42,382	273	
Improved	-	71	
Ducks	-	-	-
Turkey and others	-	-	-

Category	Area	Production	Productivity
Fish	-		
Marine	-		
Inland	1306 ha	16,000 metric ton	650-700 kg/ha
Prawn	-	-	-
Scampi	-	-	-
Shrimp	-	-	-

# 2.7 **District profile has been Updated for 2013-14** Yes / No: Yes

# 2.8 Details of Operational area / Villages

Sl.No.	Taluk	Name of the block	Name of the village	How long the village is covered under operational area of the KVK (specify the years)	Major crops & enterprises	Major problem identified	Identified Thrust Areas
1	Tiptur	Honnavalli	Honnavalli Pattarehalli Lakkihalli	3 year	Redgram Tomato Banana Banana Rangapura	Use of local and old varieties, yield decline due to delayed sowing Incidence of pod borer menace Low nutrient use efficiency Wider spacing, less number of plants per unit area Incidence of Sigatoka leaf spot and Panama Wilt Lack of awareness on methodology for grading of copra and marketing	Maintaining crop productivity through soil & pest management
2	Turvekere	Mayasandra	Mavinkere Dhabbegatta Obenagasandra Devihalli	3 year	Fingermillet Bengalgram Field bean Tomato Arecanut Banana	Neck and finger blast, Lack of knowledge on value addition Inefficient use of paddy fallows Use of local and old varieties Improper plant protection measures for wilt including use of tolerant variety Improper control measures for pod borer Low yield, Lack of HYVs, Improper nutrient management Severe nut splitting and yield loss due to deficiency of boran	Introduction of high yielding varieties Nutrient and water management
3	C.N. Halli	Shettikere	Shettikere Kuppur Thamadihalli Gopalanahalli	3 year	Mango Groundnut Kodomillet Coconut Vegetable Banana	Low soil fertility, high weed infestation and lower income Low yield potential of existing ruling varieties Lack of awareness on branding and labelling of Kodomillet products Severe incidence of Basal stem rot leading to death of palm Inefficient use of space, and lower income from mono cropping	Maintaing productivity through introduction of high yielding variety Pest management
4	Gubbi	Nittur	Nittur Muganahunase	3 year	Mango Arecanut Coconut Vegetable Banana	Higher incidence of fruit flies, traditional method of harvesting, secondary infection and poor quality fruits Inefficient use of space, weed menace, low soil fertility, lower income from mono cropping Inefficient use of space, low soil fertility, heavy weed growth  Severe incidence of Red palm weevil and Black headed caterpillar leading to yield decline	Maintaining productivity Sustainable income generation through animal husbandry activities

5	Kunigal	Yediyur	Yediyur	3 years	Coconut Arecanut Vegetable Paddy Finger millet	Low soil fertility, high weed infestation and lower income Low yield potential of existing ruling varieties Lack of awareness on branding and labelling of Kodomillet products Severe incidence of Basal stem rot leading to death of palm Inefficient use of space, and lower income from mono cropping	
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# 2.9 Priority thrust areas

S. No	Thrust areas
1	Natural resource management
2	Integrated nutrient management
3	Integrated pest management
4	Processing and value addition of agriculture produce
5	Promotion of fodder varieties
6	Promotion of dry land horticulture
7	Income generating activities for SHG's

# PART III - TECHNICAL ACHIEVEMENTS

3.A. Details of target and achievements of mandatory activities

OFT				FLD				
1				2				
Nui	Number of OFTs Number of farmers		ber of farmers	Number of FLDs		Number of farmers		
Targets	Achievement	Targets	Achievement	Targets	Achievement	Targets	Achievement	
4	4	19	08	15	15	130	141	

Training				Extension Programmes			
3				4			
Number of Courses		Number of Participants		Number of Programmes		Number of participants	
Targets	Achievement	Targets	Achievement	Targets	Achievement	Targets	Achievement
40	56	1800	2190	354	1019	29845	60149

Se	eed Production (Qtl.)	Planting ma	terials (Nos.)
	5		6
Target	Achievement	Target	Achievement
Finger Millet(MR-6): 15	Finger millet (MR-1): 30.00	Arecanuts (Hirehalli tall): 1,000	Arecanut (Hirehalli tall): 942
Redgram(BRG 4): 15	Redgram (BRG -1): 9.75	Coconuts (Tiptur tall): 5,000	Coconuts (Tiptur tall): 1000
	Little millet (OLM- 203): 11.25	Vegetables (IIHR & Pvt Variety): 3,00,000	Chilli (Arka Meghana, Arka haritha, Arka Kyathi): 80010 Tomato (Arka Rakshak): 43600 Brinjal (Arka anand): 23400 Drum stick (Bhagya, PKM-1): 5715
		Papaya (Redlady, Prabhath, Surya): 10,000	Papaya (Surya, Prabatha): 147
		Mango (Alphonso): 3,000	-

Livestock, poultry stra	ins and fingerlings (No.)	Bio-products (Kg)		
	7	8		
Target	Achievement	Target	Achievement	
-	-	-	-	

### 3.B1. Abstract of interventions undertaken based on thrust areas identified for the district as given in Sl.No.2.7

								Interventions						
S. No	Thrust area	Crop/ Enterprise	Identified Problem	Title of OFT if any	Title of FLD if any	Number of Training (farmers)	Number of Training (Youths)	Number of Training (extension personnel)	Extension activities (No.)	Supply of seeds (Qtl.)	Supply of planting materials (No.)	Supply of livestock (No.)	Supply of bio products No.	Kg
1	Production technology	Groundnut	Low yield potential of existing ruling varieties	Groundnut varieties for high yield potential	-	-	-	-	-	-	-	-	-	-
2	Production technology	Arecanut	Inefficient use of space, weed menace, low soil fertility, lower income from mono cropping	Intercrops in Arecanut garden for efficient space utilization and higher returns	-	3	-		2	Cowpea 18 kg French bean 50 kg				
3	IDM	Coconut	Severe incidence of Basal stem rot leading to death of palm	Assessment of effective control measures for Basal stem rot in Coconut	-	1	1		2				Trichoderma Neem cake	5 50
4	INM	Mango	Low soil fertility, high weed infestation and lower income	Enhancing soil fertility in mango orchards through legumes	-	1	1	-	-	-	-	-	-	-
5	Production technology	Finger millet	Neck and finger blast, Lack of knowledge on value addition	-	Finger millet var.KMR 301 for early sown conditions	2	=	-	1	-	-	1	-	-
6	ICM	Redgram	Use of local and old varieties, yield decline due to delayed sowing, Incidence of pod borer menace	-	Integrated Crop Management in Redgram	2	-	-	-	-	-	-	-	-
7	ICM	Bengal gram	Inefficient use of paddy fallows, Use of local and old varieties, Improper plant protection measures for wilt including use of tolerant variety	-	Bengal gram for residual moisture conditions	2	-	-	-	-	-	-	-	-
8	ICM	Tomato	Low yield, Lack of HYVs, Improper nutrient management	-	Integrated Crop Management in Tomato	2	1	-	-	Tomato 200 g				-
9	Production technology	Banana	Wider spacing, less number of plants per unit area	-	High density planting of Banana (G-9) for profit maximization	1	-	-	-	-	3000	-	-	-
10	Production technology	Coconut	Inefficient use of space, and lower income from mono cropping	-	Drum stick Bhagya as an profitable intercrop in Coconut	1	1	-	-	-	2500	-	-	-
11	Market linkage	Kodomillet	Lack of awareness on branding and labeling of Kodomillet products	-	Branding and market linkages to Kodo millet (Haraka) products	-	-	-	-	-	-	-	-	-
12	Market linkage	Mango	Higher incidence of fruit flies, traditional method of harvesting, secondary infection and poor quality fruits	-	Strengthening marketing linkages of mango	-	-	-	-	-	-	-	-	-
13	Market linkage	Coconut	Direct selling of copra     No grading and less return to farmers	-	Grading and marketing linkage to copra	-	-	-	-	-	-	-	-	-
14	IPM	Field bean	Improper control measures for pod borer	-	Pod borer management in Field bean	2	-	-	1	Hebbal avare 60 kg	-	=	-	-
15	IDM	Banana	Incidence of Sigatoka leaf spot and Panama Wilt	-	Management of Sigatoka leaf spot & panama wilt in Banana	2	-	-	1	-	-	-	-	-
16	IPM	Coconut	Severe incidence of Red palm weevil and Black headed caterpillar leading to yield decline	-	Integrated Management of Red palm weevil and Rhinoceros beetle in Coconut	4	1	-	2	-	-	1	-	=
17	Production technology	Tomato	Low nutrient use efficiency	-	Arka Microbial Consortium for Tomato Production	-	-	-	-	-	-	-	-	-
18	Production technology	Arecanut	Severe nut splitting and yield loss due to deficiency of boran		Management of Nut Splitting in Arecanut	1	-	-	-	-	-	-	-	-
19	Production technology	Coconut	Inefficient use of space , low soil fertility heavy weed growth	-	Mucuna as cover crop in coconut garden	1	-	-	-	-	=	-	=	-

### 3.B2. Details of technology used during reporting period

S.No	Title of Technology	Source of technology	Crop / enterprise		N	o.of programmes co	nducted
2.110	Title of Technology	Source of technology	Crop / enterprise	OFT	FLD	Training	Others (Specify)
1	2	3	4	5	6	7	8
1	Groundnut varieties for high yield potential	ICRISAT/ ANGRAU/UAS (B)	Groundnut	3	-	1	-
2	Intercrops in Arecanut garden for efficient space utilization and higher returns	IIHR, CHES, Hirehalli	Arecanut	2	-	3	-
3	Assessment of effective control measures for Basal stem rot in Coconut	UAS, Bangalore	Coconut	1	-	2	-
4	Enhancing soil fertility in mango orchards through legumes	IIHR, Bangalore	Mango	2	-	2	-
5	Finger millet var.KMR 301 for early sown conditions	UAS, Bangalore	Finger millet	-	25	2	-
6	Integrated Crop Management in Redgram	UAS, Bangalore	Redgram	-	10	2	-
7	Bengal gram for residual moisture conditions	UAS, Bangalore	Bengal gram	-	12	2	-
8	Integrated Crop Management in Tomato	IIHR, Bangalore	Tomato	-	10	3	-
9	High density planting of Banana (G-9) for profit maximization	NRCB (TN)	Banana	-	03	1	-
10	Drum stick Bhagya as an profitable intercrop in Coconut	UHS, Bagalkot	Coconut	-	10	2	-
11	Branding and market linkages to Kodo millet (Haraka) products	-	Kodomillet	-	1	-	-
12	Strengthening marketing linkages of mango	IIHR, Bangalore	Mango	-	2	-	-
13	Grading and marketing linkage to copra	UAS, Bangalore	Coconut	-	1	-	-
14	Pod borer management in Field bean	UAS, Bangalore	Field bean	-	5	2	-
15	Management of Sigatoka leaf spot & panama wilt in Banana	IIHR, Bangalore	Banana	-	10	2	-
16	Integrated Management of Red palm weevil and Rhinoceros beetle in Coconut	UAS, Bangalore	Coconut	-	10	4	-
17	Arka Microbial Consortium for Tomato Production	IIHR, Bangalore	Tomato	-	10	-	-
18	Management of Nut Splitting in Arecanut	CPCRI, Kasargod	Arecanut	-	10	1	-
19	Mucuna as cover crop in coconut garden	IIHR, Bangalore	Coconut	-	10	1	-

### 3.B2 contd..

								No. of farm	ers covered							
		0	FT			F	LD			Trai	ining			Others	(Specify)	
Sl.No	Ger	neral	SC	S/ST	General SC/ST		/ST	General SC/S		SC/ST		neral	SC	/ST		
	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F
	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
1	3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	3	-	-	-	-	-			28	10	6	10	-	-	-	-
3	1	-	-	-	-	-	-	-	80	22	20	9	-	-	-	-
4	1	-	-	-	-	-	-	-	50	25	10	6	-	-	-	-
5	-	-	-	-	19	-	6	-	17	1	2	1	-	-	-	-
6	-	-	-	-	8	-	2	-	15	2	1	1	-	-	-	-
7	-	-	-	-	9	-	3	-	19	2	2	3	-	-	-	-
8	-	-	-	-	8	-	2	-	15	10	10	10	-	-	-	-
9	-	-	-	-	2	-	1	-	4	15	2	3	-	-	-	-
10	-	-	-	-	7	-	3	-	42	10	10	3	-	-	-	-
11	-	-	-	-	12	-	-	-	-	-	-	-	-	-	-	-
12	-	-	-	-	2	-	-	-	-	-	-	-	-	-	-	-
13	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-
14	-	-	-	-	4	-	1	-	20	5	15	5	-	-	-	-
15	-	-	-	-	7	-	3	-	15	5	7	3	-	-	-	-
16	-	-	-	-	6	-	3	1	9	31	15	29	-	-	-	-
17	-	-	-	-	8	-	2	-	-	-	-	-	-	-	-	-
18	-	-	-	-	7	-	3	-	8	1	2	1	-	-	-	-
19	-	-	-	-	10	-	2	-	22	10	8	7	-	-	-	-

# PART IV - On Farm Trial

### 4.A1. 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
Integrated Nutrient Management	-	-	-	-	-	1	-	1	-	2
Varietal Evaluation		1								1
Integrated Pest Management	-	-	-	-		-	-	-	-	-
Integrated Crop Management	-	-	-	-		-	-	-	-	-
Integrated Disease Management	-	-	-	-		-	-	1	-	1
Small Scale Income Generation Enterprises	-	-	-	-		-	-	-	-	-
Weed Management	-	-	-	-		-	-	-	-	-
Resource Conservation Technology	-	-	-	-		-	-	-	-	-
Farm Machineries	-	-	-	-		-	-	-	-	-
Integrated Farming System	-	-	-	-		-	-	-	-	-
Seed / Plant production	-	-	-	-		-	-	-	-	-
Value addition	-	-	-	-		-	-	-	-	-
Drudgery Reduction	-	-	-	-		-	-	-	-	-
Storage Technique	-	-	-	-		-	-	-	-	-
Mushroom cultivation	-	-	-	-		-	-	-	-	-
Total	-	1		-	-	1	-	2	-	4

### 4.A2. 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
Integrated Nutrient Management	-	-	-	-		-	-	-	-	-
Varietal Evaluation	-	-	-	-		-	-	-	-	-
Integrated Pest Management	-	-	-	-		-	-	-	-	-
Integrated Crop Management	-	-	-	-		-	-	-	-	-
Integrated Disease Management	-	-	-	-		-	-	-	-	-
Small Scale Income Generation Enterprises	-	-	-	-		-	-	-	-	1
Weed Management	-	-	-	-		-	-	-	-	1
Resource Conservation Technology	-	-	-	-		-	-	-	-	-
Farm Machineries	-	-	-	-		-	-	-	-	1
Integrated Farming System	-	-	-	-		-	-	-	-	1
Seed / Plant production	-	-	-	-		-	-	-	-	1
Value addition	-	-	-	-		-	-	-	-	1
Drudgery Reduction	-	-	-	-		-	-	-	-	1
Storage Technique	-	-	-	-		-	-	-	-	-
Mushroom cultivation	-	-	-	-		-	-	-	-	-
Total	-	-	-	-		-	-	-	-	-

### 4.A3. Abstract on the number of technologies assessed in respect of livestock enterprises: Nil

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

### 4.A4. Abstract on the number of technologies refined in respect of livestock enterprises: Nil

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

### 4.B. Achievements on technologies Assessed and Refined

# 4.B.1. Technologies Assessed under various Crops

Thematic areas	Crop	Name of the technology assessed	No. of trials	Number of farmers	Area in ha (Per trial covering all the Technological Options)
T. A. INI. C. AM	Mango	Enhancing soil fertility in mango orchards through legumes	7	1	1.4
Integrated Nutrient Management	Arecanut	Intercrops in Arecanut garden for efficient space utilization and higher returns	7	2	1.4
Varietal Evaluation	Groundnut	Groundnut varieties for high yield potential	3	3	1.0
	-	-	-	-	-
Integrated Pest Management	-	-	-	-	-
	-	-	-	-	-
Integrated Crop Management	-	-	-	-	-
	-	-	-	-	-
Integrated Disease Management	Coconut	Assessment of effective control measures for Basal stem rot in Coconut	2	1	1
	-	-	-	-	-
Small Scale Income Generation Enterprises	-	-	-	-	-
	-	-	-	-	-

Thematic areas	Стор	Name of the technology assessed	No. of trials	Number of farmers	Area in ha (Per trial covering all the Technological Options)
Weed Management	-	-	-	-	-
	-	-	-	-	-
Resource Conservation Technology	-	-	-	-	-
	-	-	-	-	-
Farm Machineries	-	-	-	-	-
	-	-	-	-	-
Integrated Farming System	-	-	-	-	-
	-	-	-	-	-
Seed / Plant production	-	-	-	-	-
	-	-	-	-	-
Value addition	-	-	-	-	-
	-	-	-	-	-
Drudgery Reduction	-	-	-	-	-
	-	-	-	-	-
Storage Technique	-	-	-	-	-
	-	-	-	-	-
Mushroom cultivation	-	-	-	-	-
	-	-	-	-	-
Total	-	-	-	-	-

# 4.B.2. Technologies Refined under various Crops: Nil

Thematic areas	Crop	Name of the technology assessed	No. of trials	Number of farmers	Area in ha (Per trial covering all the Technological Options)
Integrated Nutrient Management	-	-	-	-	
integrated Nutrient Management	-	-	-	-	
Varietal Evaluation	-	-	-	-	
	-	-	-	-	
Integrated Pest Management	-	-	-	-	
	-	-	-	-	
Integrated Crop Management	-	-	-	-	
	-	-	-	-	
Integrated Disease Management	-	-	-	-	
	-	1	-	-	

Thematic areas	Сгор	Name of the technology assessed	No. of trials	Number of farmers	Area in ha (Per trial covering all the Technological Options)
Small Scale Income Generation Enterprises	-	-	-	-	-
	-	-	-	-	-
Weed Management	-	-	-	-	-
	-	-	-	-	-
Resource Conservation Technology	-	-	-	-	-
	-	-	-	-	-
Farm Machineries	-	-	-	-	-
	-	-	-	-	-
Integrated Farming System	-	-	-	-	-
	-	-	-	-	-
Seed / Plant production	-	-	-	-	-
	-	-	-	-	-
Value addition	-	-	-	-	-
	-	-	-	-	-
Drudgery Reduction	-	-	-	-	-
	-	-	-	-	-
Storage Technique	-	-	-	-	-
	-	-	-	-	-
Mushroom cultivation	-	-	-	-	-
	-	-	-	-	-
Total	-	-	-	-	-

### 4.B.3. Technologies assessed under Livestock and other Enterprises: Nil

Thematic areas	Name of the livestock enterprise	Name of the technology assessed	No. of trials	No. of farmers
Evaluation of breeds	-	-	-	-
Nutrition management	-	-	-	-
Disease management	-	-	-	-
Value addition	-	-	-	-
Production and management	-	-	-	-
Feed and fodder	-	-	-	-
Small scale income generating enterprises	-	-	-	-
Total			-	-

### 4.B.4. Technologies Refined under Livestock and other enterprises: Nil

Thematic areas	Name of the livestock enterprise	Name of the technology assessed	No. of trials	No. of farmers
Evaluation of breeds	-	-	-	-
Nutrition management	-	-	-	-
Disease management	-	-	-	-
Value addition	-	-	-	-
Production and management	-	-	-	-
Feed and fodder	-	-	-	-
Small scale income generating enterprises	-	-	-	-
Total	-	-	-	-

### 4.C1. Results of Technologies Assessed

### Results of On Farm Trial 1: Groundnut varieties for high yield potential

Crop/ enterprise	Farming situation	Problem definition	Title of OFT	No. of trials	Technology Assessed	Parameters of assessment	Data on the parameter	Results of assessment	Feedback from the farmer	Any refinement needed	Justification for refinement
1	2	3	4	5	6	7	8	9	10	11	12
Groundnut	Rainfed	Low yield potential of existing ruling varieties	Groundnut varieties for high yield potential	3	TO1: Use of Groundnut Var.TMV 2 TO2: Var.KCG 6 TO 3: Var.Kadiri 6 TO 4: Var.ICGV 91114	Trial is in progress	, results awaited				

#### Contd..

Technology Assessed	Source of Technology	Production	Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year)	Net Return (Profit) in Rs. / unit	BC Ratio			
13	14	15	16	17	18			
Technology option 1	UAS (B)							
(Farmer's practice)								
Technology option 2	UAS (B)	Trial is in progress, results awaited						
Technology option 3	ANGRAU							
Technology option 3	ICRISAT							

#### 4.C2. Details of On Farm Trial - 1

- 1 **Title of Technology Assessed:** Groundnut varieties for high yield potential
- 2 **Problem Definition:** Low yield potential of existing ruling varieties
- 3 Details of technologies selected for assessment:

TO1: Use of Groundnut Var.TMV 2

TO2: Var.KCG 6 TO 3 : Var.Kadiri 6

TO 4: Var.ICGV 91114

- 4 **Source of technology:** ICRISAT/ ANGRAU / UAS (B)
- 5 **Production system and thematic area:** Irrigated / varietal evaluation
- 6 Performance of the Technology with performance indicators: -
- 7. Feedback, matrix scoring of various technology parameters done through farmer's participation / other scoring Techniques:
- 8 Final recommendation for micro level situation :-
- 9 Constraints identified and feedback for research:-
- 10 Process of farmers participation and their reaction:

Trial is in progress, results awaited

# **Results of On Farm Trial - 2:** Intercrops in Arecanut garden for efficient space utilization and higher returns

Crop/ enterprise	Farming situation	Problem definition	Title of OFT	No. of trials	Technology Assessed	Parameters of assessment	Data on the parameter	Results of assessment	Feedback from the farmer	Any refinement needed	Justification for refinement
1	2	3	4	5	6	7	8	9	10	11	12
Arecanut	Irrigated	Inefficient use of	Intercrops in	7	TO 1: Arecanut sole	TO1: Arecanut yield	1.15 t/ha/year	Vegetable French	Since		
		space, weed menace, low soil fertility, lower income from mono cropping	Arecanut garden for efficient space utilization and higher returns		cropping TO 2: Arecanut + Vegetable Cowpea TO 3: Arecanut + Vegetable French bean	Soil fertility status	Soil fertility status         Before status         After status           N (Kg/ ha)         268         262           P (Kg/ ha)         19         17           K (Kg/ ha)         192         189	bean as a intercrop in arecanut garden provides higher net returns with improvement in soil fertility status	vegetable cowpe has got lower market demand, Adopting Vegetable French bean as		
						TO2: Cowpea			a intercrop in		
						parameter			arecanut		
						Plant height. (cm)	72		garden is		
						No. of branches (No.)	22-25		better		
						No. of pickings (No.)	3-4	TO1:Gross return:			
						No. of pods/plant (No.)	60-70	1,72,500			
						Length of pods (cm)	14-16cm	Net return:			
								1,12,500			
						Soil fertility status	Soil fertility Before After	B:C ratio: 2.88			
							status				
							N (Kg/ ha) 268 282	TO 2:Gross return:			
							P (Kg/ ha) 19 22	2,05,000			
							K (Kg/ ha) 192 185	Net return:			
								1,35,000			
								B:C ratio: 2.93			
						Arecanut Parameter :	1.18 t/ha/year	TOO G			
								TO3:Gross return:			
						TO3: French bean		2,22,000			
								Net return:			
						parameter Plant height. (cm)	64	1,49,000 B:C ratio: 3.04			
						No. of branches (No.)	20-23	B:C ratio: 5.04			
						No. of pickings (No.)	3-4				
						No. of pods/plant (No.)	50-60				
						Length of pods (cm)	13-15				
						Soil fertility status					
						Son fortinty status	Soil fertility Before After				
							status				
							N (Kg/ha) 268 285				
							P (Kg/ha) 19 21				1
							K (Kg/ ha) 192 186				]
						Arecanut Parameter	1.20 t/ha/year				

#### Contd..

Technology Assessed	Source of Technology	Production	Nut yield and seed yield	Net Return (Profit) in Rs. / unit	BC Ratio
13	14	15	16	17	18
Technology option 1 (Farmer's practice)	FP	Arecanut yield	1.15 t/ha/year	1,12,500	2.88
Technology option 2	UAS (B)	Arecanut yield Cowpea pod yield	1.18 t/ha/year 2.20 t/ha	1,35,000	2.93
Technology option 3	IIHR, CHES, Hirehalli	Arecanut yield French bean pod yield	1.20 t/ha/year 3.50 t/ha	1,49,000	3.04

#### 4.C2. Details of On Farm Trial- 2

- 1 **Title of Technology Assessed:** Intercrops in Arecanut garden for efficient space utilization and higher returns
- 2 **Problem Definition:** Inefficient use of space, weed menace, low soil fertility, lower income from mono cropping
- 3 Details of technologies selected for assessment:
  - TO 1: Arecanut sole cropping
  - TO 2: Arecanut + Vegetable Cowpea
  - TO 3: Arecanut + Vegetable French bean
- 4 **Source of technology: TO1:** FP **TO2:** UAS (B) **TO3:** IIHR, CHES, Hirehalli
- 5 **Production system and thematic area:** Intercropping system and Nutrient management
- 6 Performance of the Technology with performance indicators:
  - TO1: Arecanut yield: 1.15 t/ha/year
  - TO2: Arecanut yield: 1.18 t/ha/year + Cowpea yield: 2.20 t/ha TO3: Arecanut yield: 1.20 t/ha/year + French bean yield: 3.50 t/ha
- 7. Feedback, matrix scoring of various technology parameters done through farmer's participation / other scoring

### **Techniques:**

- Final recommendation for micro level situation: Vegetable French bean as a intercrop in arecanut garden provides higher net returns with improvement in soil fertility status
- 9 Constraints identified and feedback for research: Low market demand for vegetable cowpea
- Process of farmers participation and their reaction: Farmers convinced about growing vegetable French bean as an intercrop in arecanut garden

### **Results of On Farm Trial** -3: Assessment of effective control measures for Basal stem rot in Coconut

Crop/ enterprise	Farming situation	Problem definition	Title of OFT	No. of trials	Technology Assessed	Parameters of assessment	Data on the	parameter	Results of assessment	Feedback from the farmer	Any refinement needed	Justification for refinement
1	2	3	4	5	6	7	8		9	10	11	12
Coconut	Rainfed	Severe incidence of	Assessment of	2	TO 1: * Putting fire at the	No. of	Pre	Post	T3 is	Still effective	-	-
		Basal stem rot	effective control		oozing region/	functional	treatment	Treatment	effective	management		
		leading to death of	measures for Basal		base of the palm	leaves/palm			in	package is		
		palm	stem rot in Coconut		* Growing Cactus plant	TO1:	18	21	improving	needed		
					near the base of palm				growth of			
					*Making a slight cut aroun	TO2:	18	25	coconut			
					the palm				palm			
					*Brushing of lime and	TO3:	18	27	besides			
					Red earth around the				reducing			
					trunk.	No. of leaves	Pre	Post	stem rot			
					TO 2: * Opening of	drooped/ palm	treatment	Treatment				
					isolation trench around	1 1						
					the palm	TO1:	10	08				
					* Application of neem							
					cake @ 5 Kg/palm	TO2:	10	07				
					yearly							
					* Application of	TO3:	10	06				
					Trichoderma @ 250							
					gms/palm + 10 Kg FYM twice a year							
					* Root feeding of							
					Hexaconazole @							
					3ml/100 ml water/Palm							
					at quarterly interval							
					TO 3: *Application of							
					cow urine @ 10							
					litres/palm, twice a year			ĺ				
					*Application of 1Kg			ĺ				
					Lime /palm, twice a			ĺ				
					year			ĺ				
					*Application of 20			ĺ				
					Litres of cowdung							
					slurry/Palm, twice a			ĺ				
					year			ĺ				
1					*Application of			1				
					Trichoderma @ 250			ĺ				
					gms/palm, twice a year							

#### Contd..

Technology Assessed	Source of Technology	Production	Nuts/palm/year	Net Return (Profit) in Rs. / palm	BC Ratio
13	14	15	16	17	18
Technology option 1 (Farmer's practice)	FP	Nut yield	55	295	2.47
Technology option 2	UAS (B)	Nut yield	62	308	2.23
Technology option 3	ITK	Nut yield	68	382	2.66

#### 4.C2. Details of On Farm Trial - 3

- 1 Title of Technology Assessed: Assessment of effective control measures for Basal stem rot in Coconut
- 2 **Problem Definition:** Severe incidence of Basal stem rot leading to death of palm
- 3 Details of technologies selected for assessment:
  - TO 1: Putting fire at the oozing region/ base of the palm, Growing Cactus plant near the base of palm, Making a slight cut around the palm, Brushing of lime and Red earth around the trunk.
  - TO 2: Opening of isolation trench around the palm, Application of neem cake @ 5 Kg/palm yearly, Application of Trichoderma @ 250 gms/palm + 10 Kg FYM twice a year, Root feeding of Hexaconazole @ 3ml/100 ml water/Palm at quarterly interval
  - TO 3 : Application of cow urine @ 10 litres/palm, twice a year, Application of 1Kg Lime /palm, twice a year, Application of 20 Litres of cowdung slurry/Palm, twice a year, Application of Trichoderma @ 250 gms/palm, twice a year
- 4 Source of technology: ITK
- 5 **Production system and thematic area:** Coconut based cropping system and integrated disease management
- 6 Performance of the Technology with performance indicators: -
- 7. Feedback, matrix scoring of various technology parameters done through farmer's participation / other scoring

Techniques: -

- Final recommendation for micro level situation: Application of cow dung slurry and cow urine enriched Trichoderma is effective in improving coconut palm growth besides reducing Basal stem rot
- 9 **Constraints identified and feedback for research:** Timely availability of critical inputs in required quantity for large scale application and timely information
- 10 **Process of farmers participation and their reaction:** Convinced about technology

# Results of On Farm Trial 4: Enhancing soil fertility in mango orchards through legumes

Crop/ enterprise	Farming situation	Problem definition	Title of OFT	No. of trials	Technology Assessed	Parameters of assessment	Data on the parameter	Results of assessment	Feedback from the farmer	Any refinement needed	Justification for refinement
1 Mango	2 Rainfed	Low soil fertility, high weed infestation and lower income	4 Enhancing soil fertility in mango orchards through legumes	5	6 TO1: Mango as sole crop TO2: Cowpea as intercrop in mango TO3: Redgram + Green gram (1:4) as intercrop in mango	7 TO1: Soil fertility status	Soil fertility status   Soil fertility parameter   Before   After	9 Mango – Yield data is awaited	TO3: Soil fertility status Improved Mango Yield data is awaited Intercrop Redgram yield: 2.90 q/ha Intercrop Green		
						Mango yield	Yield data is awaited		gram yield:1.00 q/ha		
						TO2: Soil fertility status	TO2:         Soil fertility parameter       Before       After         Soil pH       5.67       6.32         EC (ds/m)       0.44       0.37         Organic carbon %       0.23       0.25         N (Kg/ ha)       289       297         P (Kg/ ha)       16       19         K (Kg/ ha)       175       164				
						Mango yield Intercrop yield	Yield data is awaited Cowpea yield : 3.40 q/ha				
						TO3: Soil fertility status	TO3:         Soil fertility parameter       Before       After         Soil pH       5.67       6.25         EC (ds/m)       0.44       0.36         Organic carbon %       0.23       0.27         N (Kg/ ha)       289       292         P (Kg/ ha)       16       18         K (Kg/ ha)       175       173				
						Mango yield Intercrop yield	Yield data is awaited Redgram yield: 2.90 q/ha Intercrop Green gram yield: 1.00 q/ha				

#### Contd..

Technology Assessed	Source of Technology	Production	Seed yield (q/ha)	Net Return (Profit) in Rs. / unit	BC Ratio			
13	14	15	16	17	18			
Technology option 1 (Farmer's practice)	FP	Mango – Yield data is awaited	-					
Technology option 2	UAS (B)	Mango – Yield data is awaited Intercrop cowpea yield:	- 3.40 q/ha	Mango – Yield data is awaited				
Technology option 3	IIHR, Bangalore	Mango – Yield data is awaited Intercrop Redgram yield: Intercrop Green gram yield:	- 2.90 q/ha 1.00 q/ha					

### 4.C2. Details of On Farm Trial - 4

- Title of Technology Assessed: Enhancing soil fertility in mango orchards through legumes
- 2 **Problem Definition:** Low soil fertility, high weed infestation and lower income
- 3 Details of technologies selected for assessment:

TO1: Mango as sole crop

TO2: Cowpea as intercrop in mango

TO3: Redgram – Green gram (1:4) as intercrop in mango

- 4 **Source of technology:** IIHR, Bangalore
- 5 **Production system and thematic area:** Intercropping system & Nutrient management
- 6 Performance of the Technology with performance indicators: -
- 7. Feedback, matrix scoring of various technology parameters done through farmer's participation / other scoring

Techniques: -

- Final recommendation for micro level situation: Best option as Redgram + Greengram (1:4) as both have good market demand besides improving soil fertility status
- 9 Constraints identified and feedback for research: -
- Process of farmers participation and their reaction: Farmers convinced about growing Redgram + Greengram (1:4) as an intercrop in Mango orchards

### 4.D1. Results of Technologies Refined

### **Results of On Farm Trial**

Crop/ enterprise	Farming situation	Problem definition	Title of OFT	No. of trials	Technology refined	Parameters of refined t	Data on the parameter	Results of refinement	Feedback from the farmer	Details of refinement done
1	2	3	4	5	6	7	8	9	10	11
-	-	-	-	-	-	-	-	-	-	-

#### Contd..

Technology Refined	Source of Technology For Technology Option1 / Justification for modification of assessed Technology Option 1	Production	Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year)	Net Return (Profit) in Rs. / unit	BC Ratio
13		14	15	16	17
Technology Option 1 (best performing Technology Option in assessment)	-	-	-	-	-
Technology Option 2 (Modification over Technology Option 1)	-	-	-	-	-
Technology Option 3 (Another Modification over Technology Option 1)	-	-	-	-	-

### 4.D.2. Details of each On Farm Trial for refinement to be furnished in the following format separately as per the following details:

- Title of Technology refined
- Problem Definition
- Details of technologies selected for refinement Source of technology

- Production system and thematic area
  Performance of the Technology with performance indicators
- Feedback, matrix scoring of various technology parameters done through farmer's participation / other scoring techniques
- Final recommendation for micro level situation
- Constraints identified and feedback for research 9
- 10 Process of farmers participation and their reaction

# PART V - FRONTLINE DEMONSTRATIONS

### 5.A. Summary of FLDs implemented during 2013-14

Sl. No.	Category	Farming Situation	Season and	Crop	Variety/ breed	Hybrid	Thematic area	Technology Demonstrated	Area (ha)			of farme		Reasons for shortfall in achievement
			Year						Proposed	Actual	SC/ST	Others	Total	
Oilse		-	-	-	-	-	-	-	-	-	-	-	-	-
Pulse	es													
1	Pulses	Rainfed	Kharif 2013	Redgram	BRG-4	-	ICM	Integrated Crop Management in Redgram Use of var.BRG 4 Installation of bird perches Use of pheromone traps Spraying of Thiodicarb at flowering stage Spraying of NPV at flowering to pod formation stage Spraying Indoxicarb at Pod formation –maturity stage	4	4	2	8	10	
2	Pulses	Rainfed	Rabi 2013	Bengal gram	JG- 11	-	ICM	Bengal gram for residual moisture conditions Use of improved variety JG 11 (tolerant to wilt and drought)	5	5	3	9	12	
3	Pulses	Rainfed/ protected irrigation	Kharif 2013	Field bean	HA-4	-	IPM	Pod borer management in Field bean Use of pheromone traps Spraying of Ha NPV against early instar larvae Spraying of Indoxacarb against late instar larvae	2	2	1	4	5	
Cere	als											•		
Mille	ets													
4	Millets	Rainfed	Kharif 2013	Finger millet	KMR- 301	-	Production technology	Finger millet var.KMR 301 for early sown conditions Use of neck & finger blast tolerant variety (KMR 301) and improved nutrient management practices Value addition aspects	10	10	6	19	25	
5	Millets	-	Kharif 2013	Kodo millet		-	Market linkage	Branding and market linkages to Kodo millet (Haraka) products Branding, Packaging and nutrition labeling of Haraka products Preparation of Haraka rice and papad	1 CBO	1 CBO	-	12	12	
Vege	tables													
6	Vegetables	Irrigated	Rabi 2013	Tomato	-	Arka Rakshak	ICM	Integrated Crop Management in Tomato  *Use of HYV Arka Rakshak  *Foliar spray of Vegetable special	2	2	2	8	10	
7	Vegetables	Irrigated	Kharif 2013	Tomato	-	Arka Rakshak	Production technology	Arka Microbial Consortium for Tomato Production FYM 25 t/ha+ 75% RDF 250:250:250 NPK Kg/ha + Arka microbial consortium 12.5 Kg/ha	2	2	2	8	10	
8	Vegetables	Irrigated	Kharif 2013	Drumstick	Bhagya (KDM-01)	-	Production technology (Intercropping)	Drum stick Bhagya as an profitable intercrop in Coconut	2	2	3	7	10	
Flow														
	mental													
Fruit	crops	1	1		1				1	ı	_			T
9	Fruit	Irrigated	Rabi	Banana	Tissue	-	Production	High density planting of Banana (G-9) for profit	0.6	0.6	1	2	3	-

														28
Sl. No.	Category	Farming Situation	Season and	Crop	Variety/ breed	Hybrid	Thematic area	Technology Demonstrated	Area	(ha)		. of farme monstratio		Reasons for shortfall in achievement
- 1.01			Year						Proposed	Actual	SC/ST	Others	Total	
			2013		culture (G-9)		technology	maximization *High density planting of Banana (G-9) with zig zag method (1.2 m x 1.2m x 2.0 m) No. of Plants 2080 / acre						
10	Fruit	Rainfed	Kharif 2013	Mango	-	1	INM	*Strengthening marketing linkages of mango *Scientific production and harvesting of mango *Ethylene mediated ripening technology using polythene tents *Packaging and labeling through corrugated boxes *Marketing	2.5	2.5	0	2	2	-
11	Fruit	Irrigated	Kharif 2013	Banana	Puttabale Yelakki	-	IDM	Management of Sigatoka leaf spot & panama wilt in Banana *Spraying of Thiophanate methyl solution 0.1% for Sigatoka leaf spot *Treating Rhizome with 0.1% Carbendazim for Panama wilt *Rhizome injection of Carbendizium (20 gm/Lit); 10ml solution/plant at 2 months interval	4	4	3	7	10	-
	s and condiment	s												
	mercial													
	cinal and aroma	tic												
Fodd	er tation													
12	Plantation	-	-	Coconut	-	-	Market linkage	Grading and marketing linkage to copra Size(Diameter) min in mm -75.0 Foreign matter % max0.2 Mouldy and black kernels % count max -2.0 Wrinkled kernels % by count max - 10.0 Chips % by weight max -1.0 Moisture content% by weight max -7.0	-	-	-	-	1 unit	
13	Plantation	Rainfed / protected irrigation	Kharif 2013	Coconut	Arsikere tall	-	IPM	Integrated Management of Red palm weevil and Rhinoceros beetle in Coconut  *Hooking of rhinoceros beetle  *Injection of Nuvan into bored holes  *Treating FYM pits with 2% chlorpyriphos solution for rhinoceros beetle  *Use of Pheromone traps (RPW and RB traps)	4	4	4	6	10	
14	Plantation	Irrigated	Kharif 2013	Arecanut	Local	-	Production technology	Management of Nut Splitting in Arecanut FYM 12 Kg/tree+ RDF 100:40:140 NPK g/tree+ Borax 30g/tree	4	4	3	7	10	
15	Plantation	Rainfed / protected irrigation	Kharif 2013	Coconut	Arka Ashwini	-	Production technology	Mucuna as cover crop in coconut garden	5	5	2	10	12	
	T211	1		1	1		·			I		1		l

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Fibre

Dairy

Poultry Rabbitry

Pigerry

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Sl. No.	Category	Farming Situation	Season and	Crop	Variety/ breed	Hybrid	Thematic area	Technology Demonstrated	Area	(ha)		. of farmer monstratio		Reasons for shortfall in achievement
			Year						Proposed	Actual	SC/ST	Others	Total	
	Sheep and goat	-	-	-	-	-	-	-	-	-	-	-	-	-
	Duckery	-	-	-	-	-	-	-	-	-	-	-	-	-
	Common carps	-	-	-	-	-	-	-	-	-	-	-	-	-
	Mussels	-	-	-	-	-	-	-	-	-	-	-	-	-
	Ornamental fishes	-	-	-	-	-	-	-	-	-	-	-	-	-
	Oyster mushroom	-	-	-	-	-	-	-	-	-	-	-	-	-
	Button mushroom	-	-	-	-	-	-	-	-	-	-	-	-	-
	Vermicompost	-	-	-	-	-	-	-	-	-	-	-	-	-
	Sericulture	-	-	-	-	-	-	-	-	-	-	-	-	-
	Apiculture	-	-	-	-	-	-	-	-	-	-	-	-	-
	Implements	-	-	-	-	-	-	-	-	-	-	-	-	-
	Others (specify)	-	-	-	-	-	-	-	-	-	-	-	-	-

### 5.A. 1. Soil fertility status of FLDs plots during 2013-14

Sl. No.	Category	Farming Situation	Season and	Crop	Variety/ breed	Hybrid	Thematic area	Technology Demonstrated	Season and	St	tatus of s	oil	Previous crop grown
110.		Situation	Year		breed		area		year	N	P	K	
Oilse	eds												
Pulse	es												
1	Pulses	Rainfed	Kharif 2013	Redgram	BRG-4	-	ICM	Integrated Crop Management in Redgram Use of var.BRG 4 Installation of bird perches Use of pheromone traps Spraying of Thiodicarb at flowering stage Spraying of NPV at flowering to pod formation stage Spraying Indoxicarb at Pod formation –maturity stage	Kharif 2013	Н	М	L	Finger millet
2	Pulses	Rainfed	Rabi 2013	Bengal gram	JG- 11	-	ICM	Bengal gram for residual moisture conditions Use of improved variety JG 11 (tolerant to wilt and drought)	Rabi 2013	Н	M	L	Finger millet

											1		_
3	Pulses	Rainfed/ protected irrigation	Kharif 2013	Field bean	HA-4	-	IPM	Pod borer management in Field bean Use of pheromone traps Spraying of Ha NPV against early instar larvae Spraying of Indoxacarb against late instar larvae	Kharif 2013	Н	М	L	Finger millet
Cere	als & millets												
4	Millets	Rainfed	Kharif 2013	Finger millet	KMR- 301	-	Production technology	Finger millet var.KMR 301 for early sown conditions Use of neck & finger blast tolerant variety (KMR 301) and improved nutrient management practices Value addition aspects	Kharif 2013	L	М	L	Finger millet
5	Millets	Rainfed	Kharif 2013	Kodo millet		-	Market linkage	Branding and market linkages to Kodo millet (Haraka) products Branding, Packaging and nutrition labeling of Haraka products Preparation of Haraka rice and papad	-	-	-	-	-
Vege	etables		•										•
6	Vegetables	Irrigated	Rabi 2013	Tomato	-	Arka Rakshak	ICM	Integrated Crop Management in Tomato *Use of HYV Arka Rakshak *Foliar spray of Vegetable special	Rabi 2013	M	M	L	Cowpea
7	Vegetables	Irrigated	Kharif 2013	Tomato	-	Arka Rakshak	Production technology	Arka Microbial Consortium for Tomato Production FYM 25 t/ha+ 75% RDF 250:250:250 NPK Kg/ha + Arka microbial consortium 12.5 Kg/ha	Rabi 2013	Н	L	M	Finger millet
8	Vegetables	Irrigated	Kharif 2013	Drumstick	Bhagya (KDM-01)	-	Production technology	Drum stick Bhagya as an profitable intercrop in Coconut	Kharif 2013	М	L	М	Coconut + Tomato
Flow	ers												
Orna	amental												
9	Fruit	Irrigated	Rabi 2013	Banana	Tissue culture (G-9)		Production technology	High density planting of Banana (G-9) for profit maximization *High density planting of Banana (G-9) with zig zag method (1.2 m x 1.2m x 2.0 m) No. of Plants 2080 / acre	Rabi 2013	M	L	M	French bean / Avare
10	Fruit	Rainfed	Summer 2014	Mango	-	-	INM	*Strengthening marketing linkages of mango *Scientific production and harvesting of mango *Ethylene mediated ripening technology using polythene tents *Packaging and labeling through corrugated boxes *Marketing	Summer 2014	-	-	-	-
11	Fruit	Irrigated	Kharif 2013	Banana	Puttabale Yelakki	-	IDM	Management of Sigatoka leaf spot & panama wilt in Banana *Spraying of Thiophanate methyl solution 0.1% for Sigatoka leaf spot *Treating Rhizome with 0.1% Carbendazim for Panama wilt *Rhizome injection of Carbendizium (20 gm/Lit); 10ml solution/plant at 2 months interval	Kharif 2013	Н	М	L	Tomato/ Paddy
	es and condime	ents											
	mercial icinal and aron	natic											
Fodo		uatic											
	tation												
12	Plantation	-	-	Coconut	-	-	Market linkage	Grading and marketing linkage to copra Size(Diameter) min in mm -75.0 Foreign matter % max0.2	-	-	-	-	-

								Mouldy and black kernels % count max -2.0 Wrinkled kernels % by count max - 10.0 Chips % by weight max -1.0 Moisture content% by weight max -7.0					
13	Plantation	Rainfed / protected irrigation	Kharif 2013	Coconut	Arsikere tall	-	IPM	Integrated Management of Red palm weevil and Rhinoceros beetle in Coconut  *Hooking of rhinoceros beetle  *Injection of Nuvan into bored holes  *Treating FYM pits with 2% chlorpyriphos solution for rhinoceros beetle  *Use of Pheromone traps (RPW and RB traps)	Kharif 2013	Н	L	L	Coconut
14	Plantation	Irrigated	Kharif 2013	Arecanut	Local	-	Production technology	Management of Nut Splitting in Arecanut FYM 12 Kg/tree+ RDF 100:40:140 NPK g/tree+ Borax 30g/tree	Kharif 2013	М	L	М	Arecanut
15	Plantation	Rainfed / protected irrigation	Kharif 2013	Coconut	Arka Ashwini	-	Production technology	Mucuna as cover crop in coconut garden	Kharif 2013	M	M	L	Coconut
	Fibre												

### **5.B.** Results of Frontline Demonstrations

### **5.B.1.** Crops

Crop	Name of the technology	Variety	Hybrid	Farming	No. of	Area		Yiel	d (q/ha)		%	*Econ	omics of den	nonstration (I	Rs./ha)		*Economic (Rs.		
Сгор	demonstrated	variety	нувна	situation	Demo.	(ha)		Demo		Check	Increase	Gross Cost	Gross Return	Net Return	** BCR	Gross Cost	Gross Return	Net Return	** BCR
							H	L	A										
Pulses																			
Redgram	Integrated Crop Management in Redgram	BRG-4	-	Rainfed	10	4	12.75	9.75	11.75	10.25	14.63	14225	29500	15275	2.07	12500	23550	11050	1.88
Bengal gram	Bengal gram for residual moisture conditions	JG- 11	-	Rainfed	12	5	11.50	8.00	9.50	8.25	15.15	12775	29500	16725	2.30	11125	23750	12625	2.13
Pulses	Pod borer management in Field bean	HA-4	-	Rainfed/ protected irrigation	5	2	9.50	7.00	8.25	6.75	22.22	22000	45375	22375	2.06	20000	37125	17125	1.85
Cereals																			
Millets	Finger millet var.KMR 301 for early sown conditions	KMR- 301	-	Rainfed	25	10	22.5	18.5	26.5	20.75	27.71	11225	26577	15352	2.36	10785	22650	11865	2.10
Millets	Branding and market linkages to Kodo millet (Haraka) products	-	-	-	1 unit	-	-	-	-	-	-	3175	10252	7077	-	0	5100	5100	-
Vegetable																			
Tomato	Integrated Crop Management in Tomato	-	Arka Rakshak	Irrigated	10	2	640	420	570	440	29.5	75000	228000	153000	3.04	78000	176000	98000	2.26
Tomato	Arka Microbial Consortium for Tomato Production	-	Arka Rakshak	Irrigated	10	2	650	460	540	480	12.5	74000	216000	142000	2.90	79000	192000	113000	2.40

Crop	Name of the technology	Variety	Hybrid	Farming	No. of	Area		Yiel	d (q/ha)		%	*Econ	nomics of den	nonstration (l	Rs./ha)		*Economic		
Сгор	demonstrated	variety	пунна	situation	Demo.	(ha)		Demo		Check	Increase	Gross Cost	Gross Return	Net Return	** BCR	Gross Cost	Gross Return	Net Return	** BCR
							Н	L	A										
Drum stick	Drum stick Bhagya as an profitable intercrop in Coconut	Bhagya (KDM- 01)	-	Irrigated	10	2						Under progr	ress – Floweri	ing & Fruiting	stage				
Flowers	-	-	_	-	-	-	-	-	-	-	-	_	_	-	-	-	-	-	-
Ornamental	_	_	_	_	-	_	_	_	_	-	_	_	_	_	_	-	_	_	-
Fruit																			
Banana	High density planting of Banana (G-9) for profit maximization	Tissue culture (G-9)	-	Irrigated	3	0.6							Under pro	gress					
Mango	Strengthening marketing linkages of mango	-	-	Rainfed	2 units	-	- Under progress												
Banana	Management of Sigatoka leaf spot & panama wilt in Banana	Puttabale Yelakki	-	Irrigated	10	4	4 Under progress												
Spices and condime		1	1	1	<u>l</u>	l													-
Commercial																			
Fibre crops like cot	ton																		
Medicinal and aron	natic																		
Fodder																			
Plantation																			
Plantation	Grading and marketing linkage to copra	-	-	-	1 unit	-	-	-	-	-	-	-	11500	-	-	-	7500	-	-
								Nut	s/ Plant										
Plantation	Integrated Management of Red palm weevil and Rhinoceros beetle in Coconut	Arsikere tall	-	Rainfed / protected irrigation	10	4	85	45	62	57	57     8.77     215     562     347     2.61     205     515     310				310	2.51			
Plantation	Management of Nut Splitting in Arecanut	Local	-	Irrigated	10	4						Under p	orogress (Inflo	orescence stag	e)				
Plantation	Mucuna as cover crop in coconut garden	Arka Ashwini	-	Rainfed	12	5	9100	8500	o. / ha 8300	7500	10.70	27000	74700	45700	2.80	25000	67500	42500	2.70
Fibre	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

### Data on additional parameters other than yield (viz., reduction of percentage in weed/pest/ diseases etc.)

	Dat	a on other parameters in relation to technology de	monstrated
Title of FLD	Parameter with unit	Demo	Check
	No. tillers / plant	7	5
Finger millet var.KMR 301 for early	No. of earheads/plant	8 to 9	5 to 6
sown conditions	No,of fingers / Earhead	6 to 7	4 to 5
	Finger length (cm)	10 - 12	9 - 10
	Plant height (cm)	138	116
	No.of pods / plant	513	469
Integrated Crop Management in	No. of seeds / pod	5 to 6	3 to 4
Redgram	Test weight (g)	13.2	9.7
	Pod borer incidence (%)	8.93	18.5
	Sterility mosaic disease (%)	3.32	7.22
Bengal gram for residual moisture	Pod borer incidence (%)	10.39	21.50
conditions	Wilt disease incidence (%)	2.75	7.22
Conditions	No. of Days for Germination (days)	4	4
	Germination %	85	82
	Plant height (cm)	50-60	55
Integrated Crop Management in Tomato	days taken for flowering DAP	46- 48	44
integrated crop ivianagement in Tomato	Days taken for Harvesting	72-75	65
	Fruit weight (g)	95	105
	No. of fruits / plant	60	48
	Establishment %	76	-
	No. of days for flowering	192	
Drum stick Bhagya as an profitable	Age of seedling ready for planting	192	
intercrop in Coconut	(Days)	55	-
	Under progress – flowering and fruiting stag	9	
Pod borer management in Field bean	Field bean - Pod borer damage %	8.5	21.5
	PDI in case of :		
Management of Sigatoka leaf spot &	Sigatoka leaf spot severity (%)	6.5	13.5
panama wilt in Banana	Panama wilt incidence	8.0	18.5
Integrated Management of Red palm	RB Trapped / Trap	15	
weevil and Rhinoceros beetle in			<del>-</del>
Coconut	RPW Trapped / Trap	7	-
Arka Microbial Consortium for Tomato	Fruit weight (g)	103	94
Production	No. of fruits / plant	76	70
Management of Nut Splitting in	Boron (ppm)	Before: 0.47 After: 0.52	0.38
Arecanut	Percentage of Nut splitting	Before: 20 After: 18	21
	Soil pH	6.67	6.12
M	EC (ds/m)	0.34	0.32
Mucuna as cover crop in coconut	OC (%)	0.35	0.23
garden	Bio mass (Kg/ Sq. mt.)	2.35	
	Weed density (no/Sq. mt.)	30	258

### 5.B.2. Livestock and related enterprises: Nil

Type of	Name of the technology	Breed	No. of	No.		1	Yield	(q/ha)	%	*E		of demonstrati ./unit)	on			ics of check ./unit)	
livestock	demonstrated	Breed	Demo	of Units		Demo	)	Check if any	Increase	Gross Cost	Gross Return	Net Return	** BCR	Gross Cost	Gross Return	Net Return	** BCR
					Н	L	Α										
Dairy	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Poultry	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rabbitry	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pigerry	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sheep and goat	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Duckery	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	ı	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Data on additional parameters other than yield (viz., reduction of percentage diseases, increase in conceiving rate, inter-calving period etc.)

ı v	Data on other parameters in relation	to technology demonstrated
Parameter with unit	Demo	Check if any
-	-	-

### 5.B.3. Fisheries : Nil

Type of	Name of the	Breed	No. of	Units/		Yie	ld (q	ha)	%		nomics of Rs./unit) o				Economic Rs./unit) o		
Breed	technology demonstrated	Breed	Demo	Area (m²)	]	Demo	)	Check if any	Increase	Gross Cost	Gross Return	Net Return	** BCR	Gross Cost	Gross Return	Net Return	** BCR
					Н	L	Α										
Common																	
carps	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mussels	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ornamental																	
fishes	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Others																	
(pl.specify)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Data on additional parameters other than yield (viz., reduction of percentage diseases, effective use of land etc.)

	Data on other parameters in relation	to technology demonstrated
Parameter with unit	Demo	Check if any
-	-	-

**5.B.4. Other enterprises** 

Enterprise	Name of the technology	Variety/	No. of	Units/ Area		Yield (q/ha)		%	*Econo		onstration (Rs./us./m2)	*Economics of check (Rs./unit) or (Rs./m2)					
	demonstrated	species	Demo	{m <sup>2</sup> }	Г	Demo	,	Check if any	Increase	Gross Cost	Gross Return	Net Return ** BCR		Gross Cost	Gross Return	Net Return	** BCR
					Н	H L		,									
Oyster mushroom	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Button																	
mushroom	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Vermicompost	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sericulture	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Apiculture	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Others																	
(pl.specify)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Data on additional parameters other than yield (viz., additional income realized, employment generation, quantum of farm resources recycled etc.)

	Data on other parameters in relation to technology demonstrated										
Parameter with unit	Demo	Local									
-	-	-									

5.B.5. Farm implements and machinery

Name of the	Cost of the	Name of the technology	No. of	Area covered under demo		equirement andays	%	Savings in labour	*Econor	nics of dem	onstration (I	Rs./ha)			cs of check /ha)	
implement	implement in Rs.	demonstrated	Demo	in ha	Demo	Check	save	(Rs./ha)	Gross Gross cost Return		Net Return	** BCR	Gross Cost	Gross Return	Net Return	** BCR
-	-	Ī	-	-	-	-	-	ı	-	-	-	-	-	-	ı	
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	

<sup>\*</sup> Economics to be worked out based total cost of production per unit area and not on critical inputs alone.

\*\* BCR= GROSS RETURN/GROSS COST

### Data on additional parameters other than labour saved (viz., reduction in drudgery, time etc.)

Data on other parameters in relation to technology demonstrated										
Parameter with unit	Demo	Local								
-	-	<u>-</u>								

### 5.B.6. Extension and Training activities under FLD

Sl.No.	Activity	No. of activities organised	Number of participants	Remarks
1	Field days	8	1200	-
2	Farmers Training	22	418	-
3	Media coverage	22	-	-
4	Training for extension functionaries	-	-	-
5	Others (Please specify)	-	-	-

### PART VI – DEMONSTRATIONS ON CROP HYBRIDS

### **Demonstration details on crop hybrids**

Type of Breed	Name of the technology	Name of the	No. of	Area (ha)		Yiel	d (q/ha	a)	%	*Ec		f demonstrat s./ha)			*Economics of check (Rs./ha)			
Type of Breed	demonstrated	hybrid	Demo			Demo		Check	k Increase	Gross Cost	Gross Return	Net Return	** BCR	Gross Cost	Gross Return	Net Return	** BCR	
					Н	L	Α										1	
Cereals	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Bajra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Maize	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Paddy	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Sorghum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Wheat	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Others	_	_	_	_	_	_	_		_	_	_	_	_	_	_		_	
(pl.specify)	-	-	-	-	_	_	_	_	-	_	-	-	_	-	-	-		
Total	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Oilseeds	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Castor	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Mustard	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Safflower	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Sesame	=	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Sunflower	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Groundnut	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Soybean	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Others					_		_		_		_	_		_	_	_		
(pl.specify)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Total	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Pulses	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Greengram	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Blackgram	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Bengalgram	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Redgram	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Others									_						_			
(pl.specify)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
Total	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Vegetable crops	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Bottle gourd	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Capsicum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Total	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Cucumber	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Tomato	Integrated Crop Management in Tomato	Arka Rakshak	10	2	640	420	570	440	29.5	75000	228000	153000	3.04	78000	176000	98000	2.26	
Tomato	Arka Microbial Consortium for Tomato Production	Arka Rakshak	10	2	650	460	540	480	12.5	74000	216000	142000	2.90	79000	192000	113000	2.40	
Brinjal	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Okra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Onion	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Potato	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
Field bean	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	

Type of Breed	Name of the technology	Name of the	No. of	Area		Yiel	d (q/ha	1)	%	*Ec		demonstrat ./ha)	ion			cs of check ./ha)	
Type of Breed	demonstrated	hybrid	Demo	(ha)		Demo		Check	Increase	Gross Cost	Gross Return	Net Return	** BCR	Gross Cost	Gross Return	Net Return	** BCR
					Н	L	Α										
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Commercial																	
crops	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sugarcane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coconut	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Others	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fodder crops	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Maize (Fodder)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sorghum (Fodder)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

## PART VII. TRAINING

## 7.A.. Training of Farmers and Farm Women including sponsored training programmes (On campus)

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			<b>Grand Total</b>	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Crop Production	-	-	-	-	-	-	-	-	-	-
Weed Management	-	-	-	-	-	-	-	-	-	-
Resource Conservation Technologies	1	36	7	43	23	1	24	59	8	67
Cropping Systems	-	-	-	-	-	-	-	-	-	-
Crop Diversification	-	-	-	-	-	-	-	-	-	-
Integrated Farming	-	-	-	-	-	-	-	-	-	-
Micro Irrigation/Irrigation	-	-	-	-	-	-	-	-	-	-
Seed production	-	-	-	-	-	-	-	-	-	-
Nursery management	1	10	3	13	5	2	7	15	5	20
Integrated Crop Management	-	-	-	-	-	-	-	-	-	-
Soil and Water Conservation	-	-	-	-	-	-	-	-	-	-
Integrated Nutrient Management (Arecanut)	1	8	1	9	2	1	3	10	2	12
Integrated Nutrient Management	-	-	-	-	-	-	-	-	-	-
Production of organic inputs	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Horticulture	-	-	-	-	-	-	-	-	-	-
a) Vegetable Crops	-	-	-	-	-	-	-	-	-	-
Production of low value and high volume crop	-	-	-	-	-	-	-	-	-	-
Off-season vegetables	-	-	-	-	-	-	-	-	-	-
Nursery raising	-	-	-	-	-	-	-	-	-	-
Exotic vegetables	-	-	-	-	-	-	-	-	-	-
Export potential vegetables	-	-	-	-	-	-	-	-	-	-
Grading and standardization	-	-	-	-	-	-	-	-	-	-
Protective cultivation	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
b) Fruits	-	-	-	-	-	-	-	-	-	-
Training and Pruning	-	-	-	-	-	-	-	-	-	-
Layout and Management of Orchards	-	-	-	-	-	-	-	-	-	-
Cultivation of Fruit - Mango	-	-	-	-	-	-	-	-	-	-
Management of young plants/orchards	-	-	-	-	-	-	-	-	-	-
Rejuvenation of old orchards	-	-	-	-	-	-	-	-	-	-
Export potential fruits	-	-	-	-	-	-	-	-	-	-
Micro irrigation systems of orchards	-	-	-	-	-	-	-	-	-	-
Plant propagation techniques	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
c) Ornamental Plants	-	-	-	-	-	-	-	-	-	-
Nursery Management	1	1	0	1	20	7	27	21	7	28
Management of potted plants	-	-	-	-	-	-	-	-	-	-
Export potential of ornamental plants	-	-	-	-	-	-	-	-	-	-
Propagation techniques of Ornamental Plants	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
d) Plantation crops	-	-	-	-	-	-	-	-	-	-
Production and Management technology (coco)	1	23	1	24	11	0	11	34	1	35
Processing and value addition	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
e) Tuber crops	-	-	-	-	-	-	-	-	-	-
Production and Management technology	-	-	-	-	-	-	-	-	-	-
Processing and value addition	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
f) Spices	-	-	-	-	-	-	-	-	-	-
Production and Management technology	-	-	-	-	-	-	-	-	-	-
Processing and value addition	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
g) Medicinal and Aromatic Plants	-	-	-	-	-	-	-	-	-	-
Nursery management	-	-	-	-	-	-	-	-	-	-
Production and management technology	-	-	-	-	-	-	-	-	-	-
Post harvest technology and value addition	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Soil Health and Fertility Management	-	-	-	-	-	-	-	-	-	-
Soil fertility management	-	-	-	-	-	-	-	-	-	-
Integrated water management	-	-	-	-	-	-	-	-	-	-
Integrated nutrient management	-	-	-	-	-	-	-	-	-	-
Production and use of organic inputs	-	-	-	-	-	-	-	-	-	-
Management of Problematic soils	-	-	-	-	-	-	-	-	-	-
Micro nutrient deficiency in crops	-	-	-	-	-	-	-	-	-	-
Nutrient use efficiency	-	-	-	-	-	-	-	-	-	-
Balanced use of fertilizers	-	-	-	-	-	-	-	-	-	-
Soil and water testing	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Livestock Production and Management	-	-	-	-	-	-	-	-	-	-
Dairy Management	-	-	-	-	-	-	-	-	-	-
Poultry Management	-	-	-	-	-	-	-	-	-	-
Piggery Management	-	-	-	-	-	-	-	-	-	-
Rabbit Management	-	-	-	-	-	-	-	-	-	-
Animal Nutrition Management	1	39	1	40	7	0	7	46	1	47
Animal Disease Management	-	-	-	-	-	-	-	-	-	-
Feed and Fodder technology	1	103	5	108	34	3	37	137	8	145
Production of quality animal products	1	6	5	11	8	0	8	14	5	19
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Home Science/Women empowerment	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Household food security by kitchen gardening and nutrition gardening	-	-	-	-	-	-	-	-	-	-
Design and development of low/minimum cost diet	-	-	-	-	-	-	-	-	-	-
Designing and development for high nutrient efficiency diet	1	0	15	15	0	6	6	0	21	21
Minimization of nutrient loss in processing										
Processing and cooking	-	-	-	-	-	-	-	-	-	-
Gender mainstreaming through SHGs	-	-	-	-	-	-	-	-	-	-
Storage loss minimization techniques	-	-	-	-	-	-	-	-	-	-
Value addition	2	25	10	35	10	3	13	35	13	48
Women empowerment	-	-	-	-	-	-	-	-	-	-
Location specific drudgery production	-	-	-	-	-	-	-	-	-	-
Rural Crafts	-	-	-	-	-	-	-	-	-	-
Women and child care	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Agril. Engineering	-	-	-	-	-	-	-	-	-	-
Farm machinery and its maintenance	-	-	-	-	-	-	-	-	-	-
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 Technology	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Plant Protection	-	-	-	-	-	-	-	-	-	-
Integrated Pest Management	13	146	6	152	106	8	124	262	14	276
Integrated Disease Management	-	-	-	-	_	-	-	-	-	-
Bio-control of pests and diseases	-	-	-	-	-	-	-	-	-	-
Production of bio control agents and bio pesticides (Trichoderma)	1	22	0	22	11	0	11	33	0	33
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participan	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
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	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
	-	-	-	-	-	-	-	-	-	-
Production of Inputs at site										
Seed Production	-	-	-	-	-	-	-	-	-	-
Planting material production	-	-	-	-	-	-	-	-	-	-
Bio-agents production	-	-	-	-	-	-	-	-	-	-
Bio-pesticides production	-	-	-	-	-	-	-	-	-	-
Bio-fertilizer production	-	-	-	-	-	-	-	-	-	-
Vermi-compost production	-	-	-	-	-	-	-	-	-	-
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	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Mushroom production	-	-	-	-	-	-	-	-	-	-
Apiculture	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Capacity Building and Group Dynamics	-	-	-	-	-	-	-	-	-	-
Leadership development	-	-	-	-	-	-	-	-	-	-
Group dynamics	-	-	-	-	-	-	-	-	-	-
Formation and Management of SHGs	-	-	-	-	-	-	-	-	-	-
Mobilization of social capital	-	-	-	-	-	-	-	-	-	-
Entrepreneurial development of farmers/youths	-	-	-	-	-	-	-	-	-	-
Others ( CBO formation)	1	17	0	17	10	0	10	27	0	27
Others ( ICT Importance)	-	-	-	-	-	-	-	-	-	-
Agro-forestry	-	-	-	-	-	-	-	-	-	-
Production technologies	-	-	-	-	-	-	-	-	-	-
Nursery management	-	-	-	-	-	-	-	-	-	-
Integrated Farming Systems	-	-	-	-	-	-	-	-	-	-
Others (Pl. specify)	3	58	16	74	38	3	41	96	19	115
TOTAL	29	494	70	564	285	34	329	789	104	893

## 7.B Training of Farmers and Farm Women including sponsored training programmes (Off campus)

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Crop Production	-	-	-	-	-	-	-	-	-	-
Weed Management	-	-	-	-	-	-	-	-	-	-
Resource Conservation Technologies	-	-	-	-	-	-	-	-	-	-
Cropping Systems	-	-	-	-	-	-	-	-	-	-
Crop Diversification	-	-	-	-	-	-	-	-	-	-
Integrated Farming	-	-	-	-	-	-	-	-	-	-
Micro Irrigation/Irrigation	-	-	-	-	-	-	-	-	-	-
Seed production	-	-	-	-	-	-	-	-	-	-
Nursery management	-	-	-	-	-	-	-	-	-	-
Integrated Crop Management	-	-	-	-	-	-	-	-	-	-
Soil and Water Conservation	-	-	-	-	-	-	-	-	-	-
Integrated Nutrient Management	-	-	-	-	-	-	-	-	-	-
Production of organic inputs	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Horticulture	-	-	-	-	-	-	-	-	-	-
a) Vegetable Crops	-	-	-	-	-	-	-	-	-	-
Production of low value and high volume crop	-	-	-	-	-	-	-	-	-	-
Off-season vegetables (Tomato)	2	17	33	50	3	28	31	20	65	85
Nursery raising	-	-	-	-	-	-	-	-	-	-
Exotic vegetables	-	-	-	-	-	-	-	-	-	-
Export potential vegetables	-	-	-	-	-	-	-	-	-	-
Grading and standardization	-	-	-	-	-	-	-	-	-	-
Protective cultivation	-	-	-	-	-	-	-	-	-	-
Others	-	-	-	-	-	-	-	-	-	-
Integrated Crop Management in Tomato	1	23	12	35	6	4	10	29	16	45
Drum stick Bhagya as an profitable intercrop in Coconut	1	12	15	27	5	5	10	17	20	37
b) Fruits										

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Training and Pruning	-	-	-	-	-	-	-	-	-	-
Layout and Management of Orchards	-	-	-	-	-	-	-	-	-	-
Cultivation of Fruit (mango)	1	18	10	28	6	8	14	24	18	42
Management of young plants/orchards	-	-	-	-	-	-	-	-	-	-
Rejuvenation of old orchards	-	-	-	-	-	-	-	-	-	-
Export potential fruits	-	-	-	-	-	-	-	-	-	-
Micro irrigation systems of orchards	-	-	-	-	-	-	-	-	-	-
Plant propagation techniques	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
c) Ornamental Plants	-	-	-	-	-	-	-	-	-	-
Nursery Management	-	-	-	-	-	-	-	-	-	-
Management of potted plants	-	-	-	-	-	-	-	-	-	-
Export potential of ornamental plants	-	-	-	-	-	-	-	-	-	-
Propagation techniques of Ornamental Plants	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
d) Plantation crops	-	-	-	-	-	-	-	-	-	-
Production and Management technology (Coconut)	2	68	24	92	27	16	43	95	40	135
Production and Management technology (Arecanut)	1	30	8	38	16	0	16	46	8	54
Processing and value addition	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Vegetable as a intercrops in Arecanut	1	14	20	24	10	10	20	24	30	54
e) Tuber crops	-	-	-	-	-	-	-	-	-	-
Production and Management technology	-	-	-	-	-	-	-	-	-	-
Processing and value addition	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
f) Spices	-	-	-	-	-	-	-	-	-	-
Production and Management technology	-	-	-	-	-	-	-	-	-	-
Processing and value addition	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
	0.000	Male	Female	Total	Male	Female	Total	Male	Female	Total
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
g) Medicinal and Aromatic Plants	-	-	-	-	-	-	-	-	-	-
Nursery management	-	-	-	-	-	-	-	-	-	-
Production and management technology	-	-	-	-	-	-	-	-	-	-
Post harvest technology and value addition	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Soil Health and Fertility Management	-	-	-	-	-	-	-	-	-	-
Soil fertility management	-	-	-	-	-	-	-	-	-	-
Integrated water management	-	-	-	-	-	-	-	-	-	-
Integrated nutrient management	-	-	-	-	-	-	-	-	-	-
Production and use of organic inputs	-	-	-	-	-	-	-	-	-	-
Management of Problematic soils	-	-	-	-	-	-	-	-	-	-
Micro nutrient deficiency in crops	-	-	-	-	-	-	-	-	-	-
Nutrient use efficiency	-	-	-	-	-	-	-	-	-	-
Balanced use of fertilizers	-	-	-	-	-	-	-	-	-	-
Soil and water testing	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Livestock Production and Management	-	-	-	-	-	-	-	-	-	-
Dairy Management	-	-	-	-	-	-	-	-	-	-
Poultry Management	-	-	-	-	-	-	-	-	-	-
Piggery Management	-	-	-	-	-	-	-	-	-	-
Rabbit Management	-	-	-	-	-	-	-	-	-	-
Animal Nutrition Management	-	-	-	-	-	-	-	-	-	-
Animal Disease Management	-	-	-	-	-	-	-	-	-	-
Feed and Fodder technology	-	-	-	-	-	-	-	-	-	-
Production of quality animal products	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Home Science/Women empowerment	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participa	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Household food security by kitchen gardening and nutrition gardening	-	-	-	-	-	-	-	-	-	-
Design and development of low/minimum cost diet	-	-	-	-	-	-	-	-	-	-
Designing and development for high nutrient efficiency diet	-	-	-	-	-	-	-	-	-	-
Minimization of nutrient loss in processing	-	-	-	-	-	-	-	-	-	-
Processing and cooking	-	-	-	-	-	-	-	-	-	-
Gender mainstreaming through SHGs	-	-	-	-	-	-	-	-	-	-
Storage loss minimization techniques	-	-	-	-	-	-	-	-	-	-
Value addition	-	-	-	-	-	-	-	-	-	-
Women empowerment	-	-	-	-	-	-	-	-	-	-
Location specific drudgery production	-	-	-	-	-	-	-	-	-	-
Rural Crafts	-	-	-	-	-	-	-	-	-	-
Women and child care	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Agril. Engineering	-	-	-	-	-	-	-	-	-	-
Farm machinery and its maintenance	-	-	-	-	-	-	-	-	-	-
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 Technology	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Plant Protection	-	-	-	-	-	-	-	-	-	-
Integrated Pest Management (coconut)	6	250	72	322	109	50	159	359	122	481
Integrated Disease Management	7	100	0	100	80	0	80	180	0	180
Bio-control of pests and diseases										
Production of bio control agents and bio pesticides – Trichoderma	1	31	3	34	16	7	23	47	10	57
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-

	No. of					No. of Participar	nts			
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
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	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-

					1			1		
Production of Inputs at site	-	-	-	-	-	-	-	-	-	-
Seed Production	-	-	-	-	-	-	-	-	-	-
Planting material production	-	-	-	-	-	-	-	-	-	-
Bio-agents production	-	-	-	-	-	-	-	-	-	-
Bio-pesticides production	-	-	-	-	-	-	-	-	-	-
Bio-fertilizer production	-	-	-	-	-	-	-	-	-	-
Vermi-compost production	-	-	-	-	-	-	-	-	-	-
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	-	-	-	-	-	-	-	-	-	-
Mushroom production	-	-	-	-	-	-	-	-	-	-
Apiculture	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Capacity Building and Group Dynamics	-	-	-	-	-	-	-	-	-	-
Leadership development	-	-	-	-	-	-	-	-	-	-
Group dynamics	-	-	-	-	-	-	-	-	-	-
Formation and Management of SHGs	-	-	-	-	-	-	-	-	-	-
Mobilization of social capital	-	-	-	-	-	-	-	-	-	-
Entrepreneurial development of farmers/youths	-	-	-	-	-	-	-	-	-	-
Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
Agro-forestry	-	-	-	-	-	-	-	-	-	-
Production technologies	-	-	-	-	-	-	-	-	-	-
Nursery management	-	-	-	-	-	-	-	-	-	-
Integrated Farming Systems	1	82	18	108	20	9	29	102	27	129
Others (Pl. specify)	-	-	-	-	-	-	-	-	-	-
TOTAL	24	645	215	858	298	137	435	943	356	1299

## 7.C. Training for Rural Youths including sponsored training programmes (on campus)

	No. of				No. o	of Participants				
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Nursery Management of Horticulture crops	1	15	6	21	5	2	7	20	8	28
Training and pruning of orchards	-	-	-	-	-	-	-	-	-	-
Protected cultivation of vegetable crops	-	-	-	-	-	-	-	-	-	-
Commercial fruit production	-	-	-	-	-	-	-	-	-	-
Integrated farming	7	100	0	100	80	0	80	180	0	180
Seed production	-	-	-	-	-	-	-	-	-	-
Production of organic inputs	-	-	-	-	-	-	-	-	-	-
Planting material production	-	-	-	-	-	-	-	-	-	-
Vermi-culture	-	-	-	-	-	-	-	-	-	-
Mushroom Production	-	-	-	-	-	-	-	-	-	-
Bee-keeping	-	-	-	-	-	-	-	-	-	-
Sericulture	-	-	-	-	-	-	-	-	-	-
Repair and maintenance of farm machinery and implements	-	-	-		-	-	-	-	-	-
Value addition	-	-	-	-	-	-	-	-	-	-
Small scale processing	-	-	-	-	-	-	-	-	-	-
Post Harvest Technology	1	7	8	15	6	2	8	13	10	23
Tailoring and Stitching	-	-	-	-	-	-	-	-	-	-
Rural Crafts	-	-	-	-	-	-	-	-	-	-
Production of quality animal products	-	-	-	-	-	-	-	-	-	-
Dairying	-	-	-	-	-	-	-	-	-	-
Sheep and goat rearing	-	-	-	-	-	-	-	-	-	-
Quail farming	-	-	-	-	-	-	-	-	-	-
Piggery	-	-	-	-	-	-	-	-	-	-
Rabbit farming	-	-	-	-	-	-	-	-	-	-
Poultry production	-	-	-	-	-	-	-	-	-	-
Ornamental fisheries	-	-	-	-	-	-	-	-	-	-

	No. of				No. o	of Participants				
Area of training	Courses		General			SC/ST			<b>Grand Total</b>	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Composite fish culture	-	-	-	-	-	-	-	-	-	-
Freshwater prawn culture	-	-	-	-	-	-	-	-	-	-
Shrimp farming	-	-	-	-	-	-	-	-	-	-
Pearl culture	-	-	-	-	-	-	-	-	-	-
Cold water fisheries	-	-	-	-	-	-	-	-	-	-
Fish harvest and processing technology	-	-	-	-	-	-	-	-	-	-
Fry and fingerling rearing	-	-	-	-	-	-	-	-	-	-
Any other (pl.specify)	-	-	-	-	-	-	-	-	-	-
TOTAL	9	122	14	136	91	4	95	213	18	231

## 7.D. Training for Rural Youths including sponsored training programmes (off campus): Nil

	No. of				No. o	of Participants				
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Nursery Management of Horticulture crops	-	-	-	-	-	-	-	-	-	-
Training and pruning of orchards	-	-	-	-	-	-	-	-	-	-
Protected cultivation of vegetable crops	-	-	-	-	-	-	-	-	-	-
Commercial fruit production	-	-	-	-	-	-	-	-	-	-
Integrated farming	-	-	-	-	-	-	-	-	-	-
Seed production	-	-	-	-	-	-	-	-	-	-
Production of organic inputs	-	-	-	-	-	-	-	-	-	-
Planting material production	-	-	-	-	-	-	-	-	-	-
Vermi-culture	-	-	-	-	-	-	-	-	-	-
Mushroom Production	-	-	-	-	-	-	-	-	-	-
Bee-keeping	-	-	-	-	-	-	-	-	-	-
Sericulture	-	-	-	-	-	-	-	-	-	-
Repair and maintenance of farm machinery and implements	-	-	-	-	-	-	-	-	-	-
Value addition	-	-	-	-	-	-	-	-	-	-
Small scale processing	-	-	-	-	-	-	-	-	-	-
Post Harvest Technology	-	-	-	-	-	-	-	-	-	-
Tailoring and Stitching	-	-	-	-	-	-	-	-	-	-
Rural Crafts	-	-	-	-	-	-	-	-	-	-
Production of quality animal products	-	-	-	-	-	-	-	-	-	-
Dairying	-	-	-	-	-	-	-	-	-	-
Sheep and goat rearing	-	-	-	-	-	-	-	-	-	-
Quail farming	-	-	-	-	-	-	-	-	-	-
Piggery	-	-	-	-	-	-	-	-	-	-
Rabbit farming	-	-	-	-	-	-	-	-	-	-
Poultry production	-	-	-	-	-	-	-	-	-	-
Ornamental fisheries	-	-	-	-	-	-	-	-	-	-

	No. of				No. o	f Participants				
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Composite fish culture	-	-	-	-	-	-	-	-	-	-
Freshwater prawn culture	-	-	-	-	-	-	-	-	-	-
Shrimp farming	-	-	-	-	-	-	-	-	-	-
Pearl culture	-	-	-	-	-	-	-	-	-	-
Cold water fisheries	-	-	-	-	-	-	-	-	-	-
Fish harvest and processing technology	-	-	-	-	-	-	-	-	-	-
Fry and fingerling rearing	-	-	-	-	-	-	-	-	-	-
Any other (pl.specify)	-	-	-	-	-	-	-	-	-	-
TOTAL	-	-	-	-	-	-	-	-	-	-

## 7.E. Training programmes for Extension Personnel including sponsored training programmes (on campus)

	No. of				No.	of Participants				
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Productivity enhancement in field crops	-	-	-	-	-	-	-	-	-	-
Integrated Pest Management	2	25	3	28	18	2	20	43	5	48
Integrated Nutrient management	3	63	0	63	36	0	36	99	0	99
Rejuvenation of old orchards	-	-	-	-	-	-	-	-	-	-
Protected cultivation technology	-	-	-	-	-	-	-	-	-	-
Production and use of organic inputs	-	-	-	-	-	-	-	-	-	-
Care and maintenance of farm machinery and implements	-	-	-	-	-	-	-	-	-	-
Gender mainstreaming through SHGs	-	-	-	-	-	-	-	-	-	-
Formation and Management of SHGs	-	-	-	-	-	-	-	-	-	-
Women and Child care	-	-	-	-	-	-	-	-	-	-
Low cost and nutrient efficient diet designing	-	-	-	-	-	-	-	-	-	-
Group Dynamics and farmers organization	-	-	-	-	-	-	-	-	-	-
Information networking among farmers	-	-	-	-	-	-	-	-	-	-
Capacity building for ICT application	1	8	2	10	3	2	5	11	4	15
Management in farm animals	-	-	-	-	-	-	-	-	-	-
Livestock feed and fodder production	-	-	-	-	-	-	-	-	-	-
Household food security	1	0	15	15	0	6	6	0	21	21
Any other (pl.specify)	-	-	-	-	-	-	-	-	-	-
Total	7	96	20	116	57	10	67	153	30	183

## 7.F. Training programmes for Extension Personnel including sponsored training programmes (off campus): Nil

	No. of				No.	of Participants				
Area of training	Courses		General			SC/ST			Grand Total	
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Productivity enhancement in field crops	-	-	-	-	-	-	-	-	-	-
Integrated Pest Management	-	-	-	-	-	-	-	-	-	-
Integrated Nutrient management	-	-	-	-	-	-	-	-	-	-
Rejuvenation of old orchards	-	-	-	-	-	-	-	-	-	-
Protected cultivation technology	-	-	-	-	-	-	-	-	-	-
Production and use of organic inputs	-	-	-	-	-	-	-	-	-	-
Care and maintenance of farm machinery and implements	-	-	-	-	-	-	-	-	-	-
Gender mainstreaming through SHGs	-	-	-	-	-	-	-	-	-	-
Formation and Management of SHGs	-	-	-	-	-	-	-	-	-	-
Women and Child care	-	-	-	-	-	-	-	-	-	-
Low cost and nutrient efficient diet designing	-	-	-	-	-	-	-	-	-	-
Group Dynamics and farmers organization	-	-	-	-	-	-	-	-	-	-
Information networking among farmers	-	-	-	-	-	-	-	-	-	-
Capacity building for ICT application	-	-	-	-	-	-	-	-	-	-
Management in farm animals	-	-	-	-	-	-	-	-	-	_
Livestock feed and fodder production	-	-	-	-	-	-	-	-	-	-
Household food security	-	-	-	-	-	-	-	-	-	-
Any other (pl.specify)	-	-	-	-	-	-	-	-	-	-
Total	-	-	-	-	-	-	-	-	-	-

## 7.G. Sponsored training programmes conducted

G.M.	A 64	No. of				N	o. of Participa	nts			
S.No.	Area of training	Courses		General			SC/ST			<b>Grand Total</b>	
			Male	Female	Total	Male	Female	Total	Male	Female	Total
1	Crop production and management										
1.a.	Increasing production and productivity of crops	3	63	0	63	36	0	36	99	0	99
1.b.	Commercial production of vegetables	-	-	-	-	-	-	-	-	-	-
2	Production and value addition	-	-	-	-	-	-	-	-	-	-
2.a.	Fruit Plants - Mango	1	29	4	33	14	2	16	43	6	49
2.b.	Ornamental plants	-	-	-	-	-	-	-	-	-	-
2.c.	Spices crops	-	-	-	-	-	-	-	-	-	-
3.	Soil health and fertility management	-	-	-	-	-	-	-	-	-	-
4	Production of Inputs at site	-	-	-	-	-	-	-	-	-	-
5	Methods of protective cultivation	-	-	-	-	-	-	-	-	-	-
6	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-

7	Integrated pest and disease management	7	100	0	100	80	0	80	180	0	180
8	Post harvest technology and value addition	-	-	-	-	-	-	-	-	-	-
8.a.	Processing and value addition	-	-	-	-	-	-	-	-	-	-
8.b.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
9	Farm machinery	-	-	-	-	-	-	-	-	-	-
9.a.	Farm machinery, tools and implements	-	-	-	-	-	-	-	-	-	-
9.b.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
10.	Livestock and fisheries	-	-	-	-	-	-	-	-	-	-
11	Livestock production and management	-	-	-	-	-	-	-	-	-	-
11.a.	Animal Nutrition Management	-	-	-	-	-	-	-	-	-	-
11.b.	Animal Disease Management	-	-	-	-	-	-	-	-	-	-
11.c	Fisheries Nutrition	-	-	-	-	-	-	-	-	-	-
11.d	Fisheries Management	-	-	-	-	-	-	-	-	-	-
11.e.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
12.	Home Science	-	-	-	-	-	-	-	-	-	-
12.a.	Household nutritional security	-	-	-	-	-	-	-	-	-	-
12.b.	Economic empowerment of women	-	-	-	-	-	-	-	-	-	-
12.c.	Drudgery reduction of women	-	-	-	-	-	-	-	-	-	-
12.d.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
13	Agricultural Extension	-	-	-	-	-	-	-	-	-	-
13.a.	Capacity Building and Group Dynamics	-	-	-	-	-	-	-	-	-	-
13.b.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
	Total	11	192	4	196	130	2	132	322	6	328

- Details of sponsoring agencies involved
  1. Karnataka State Department of Agriculture
  2. Coconut Development Board, Bangalore
  3. KSRLPS, Bangalore

## 7.H. Details of Vocational Training Programmes carried out by KVKs for rural youth

		No. of				N	o. of Participa	nts			
S.No.	Area of training	Courses		General			SC/ST			<b>Grand Total</b>	
			Male	Female	Total	Male	Female	Total	Male	Female	Total
1	Crop production and management	-	-	-	-	-	-	-	-	-	-
1.a.	Commercial floriculture	-	-	-	-	-	-	-	-	-	-
1.b.	Commercial fruit production	-	-	-	-	-	-	-	-	-	-
1.c.	Commercial vegetable production	-	-	-	-	-	-	-	-	-	-
1.d.	Integrated crop management	7	100	0	100	80	0	80	180	0	180
1.e.	Organic farming	-	-	-	-	-	-	-	-	-	-
1.f.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
2	Post harvest technology and value addition	-	-	-	-	-	-	-	-	-	-
2.a.	Value addition	-	-	-	-	-	-	-	-	-	-
2.b.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
3.	Livestock and fisheries	-	-	-	-	-	-	-	-	-	-
3.a.	Dairy farming	-	-	-	-	-	-	-	-	-	-
3.b.	Composite fish culture	-	-	-	-	-	-	-	-	-	-
3.c.	Sheep and goat rearing	-	-	-	-	-	-	-	-	1	-
3.d.	Piggery	-	-	-	-	-	-	-	-	-	-
3.e.	Poultry farming	-	-	-	-	-	-	-	-	1	-
3.f.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-

4.	Income generation activities	-	-	-	-	-	-	-	-	-	-
4.a.	Vermi-composting	-	-	-	-	-	-	-	-	-	-
4.b.	Production of bio-agents, bio-pesticides, bio-fertilizers etc.	-	-	-	-	-	-	-	-	-	-
4.c.	Repair and maintenance of farm machinery and implements	-	-	-	-	-	-	-	-	-	-
4.d.	Rural Crafts	-	-	-	-	-	-	-	-	-	-
4.e.	Seed production	-	-	-	-	-	-	-	-	-	-
4.f.	Sericulture	-	-	-	-	-	-	-	-	-	-
4.g.	Mushroom cultivation	-	-	-	-	-	-	-	-	-	-
4.h.	Nursery, grafting etc.	-	-	-	-	-	-	-	-	-	-
4.i.	Tailoring, stitching, embroidery, dying etc.	-	-	-	-	-	-	-	-	-	-
4.j.	Agril. para-workers, para-vet training	-	-	-	-	-	-	-	-	-	-
4.k.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
5	Agricultural Extension	-	-	-	-	-	-	-	-	-	-
5.a.	Capacity building and group dynamics	-	-	-	-	-	-	-	-	-	-
5.b.	Others (pl.specify)	-	-	-	-	-	-	-	-	-	-
	Grand Total	7	100	0	100	80	0	80	180	0	180

## PART VIII – EXTENSION ACTIVITIES

## **Extension Programmes (including extension activities undertaken in FLD programmes)**

Nature of Extension Programme	No. of Programmes	No. of	f Participants (G	eneral)	N	lo. of Participar SC / ST	nts	No.o	f extension pers	onnel
ě	8	Male	Female	Total	Male	Female	Total	Male	Female	Total
Field Day	8	160	28	188	25	5	30			
Kisan Mela	1	20000	15000	35000	1500	1000	2000	800	300	1100
Kisan Ghosthi	1	100	50	150	-	-	-	-	-	-
Exhibition	9	1790	361	2151	250	52	302	-	-	-
Film Show	23	250	90	340	20	10	30	55	41	96
Method Demonstrations	44	320	58	378	40	33	73	-	-	-
Farmers Seminar	-	-	-	-	-	-	-	-	-	-
Workshop	1	-	-	-	-	-	-	-	-	-
Group meetings	45	250	120	370	150	53	203			
Lectures delivered as resource persons	250	700	100	800	100	245	345	-	-	-
Newspaper coverage	82	-	-	-	-	-	-	-	-	-
Radio talks	2	-	-	-	-	-	-	-	-	-
TV talks	1	-	-	-	-	-	-	-	-	-
Popular articles	12	-	-	-	-	-	-	-	-	-
Extension Literature	17	-	-	-	-	-	-	-	-	-
Advisory Services	379	200	82	282	56	41	97	-	-	-
Scientific visit to farmers field	80	180	56	236	52	24	76	-	-	-
Farmers visit to KVK	194	190	4	194	0	0	0	-	-	-
Diagnostic visits	42	120	30	150	8	0	8	-	-	-
Exposure visits	8	20	1	21	0	0	0	-	-	-
Ex-trainees Sammelan	-	-	-	-	-	-	-	-	-	-
Soil health Camp	-	-	-	-	-	-	-	-	-	-
Animal Health Camp	1	90	1	91				-	-	-
Agri mobile clinic	-	-	-	-	-	-	-	-	-	-
Soil test campaigns	-	-	-	-	-	-	-	-	-	-
Farm Science Club Conveners meet	-	-	-	-	-	-	-	-	-	-
Self Help Group Conveners meetings	-	-	-	-	-	-	-	-	-	-
Mahila Mandals Conveners meetings	-	-	-	-	-	-	-	-	-	-
Celebration of important days (World										
Environment Day, Kissan day, World	10	320	56	376	48	24	72	-	-	-
food day)				<u> </u>			<u>]                                     </u>			
Farmers Scientist interaction	5	290	60	350	35	2	37	-	-	-
SMS service	45	9000	400	9400	3000	247	3247	2500	500	3000
Total	1260	33980	16497	50477	5284	1736	6520	3355	841	4196

## <u>PART IX – PRODUCTION OF SEED, PLANT AND LIVESTOCK MATERIALS</u>

## 9.A. Production of seeds

Crop category	Name of the crop	Variety	Hybrid	Quantity of seed (qtl)	Value (Rs)	Number of farmers to whom provided
Cereals & millets (crop wise)	•			_		
	Finger millet	MR- 1	-	30.00	75000	600
	Little millet	OLM- 203	-	11.25	56250	450
Oilseeds	-	-	-	-	-	
Pulses	Redgram	BRG -1	-	9.75	43875	195
Commercial crops	-	-	-	-	-	-
Vegetables	-	-	-	-	-	-
Flower crops	-	-	-	-	-	-
Spices	-	-	-	-	-	-
Fodder crop seeds	-	-	-	-	-	-
Fiber crops	-	-	-	-	-	-
Forest Species	-	-	-	-	-	-
Others (specify)	-	-	-	-	-	-
	Total			51.00	175125	1245

## 9.B. Production of planting materials

Crop category	Name of the crop	Variety	Hybrid	Number	Value (Rs.)	Number of farmers to whom provided
Commercial	-	-	-	-	1	-
	-	-	-	-	-	-
	Chilli	-	Arka Meghana, Arka haritha, Arka Kyathi	80010	48006	50
Vegetable seedlings	Tomato	-	Arka Rakshak	43600	21800	25
	Brinjal	-	Arka anand	23400	11700	20
	Drum stick	Bhagya, PKM-1	-	5715	57150	114
Fruits	Papaya	Surya, Prabatha	-	147	1470	4
Plantation	Arecanut	Hirehalli tall	-	942	14130	10
Total				153814	154256	223

## 9.C. Production of Bio-Products: NIL

Bio Products	Name of the bio-product	Quantity Kg	Value (Rs.)	Number of farmers to whom provided
Bio Fertilizers	•	-	-	-
Bio-pesticide	•	-	-	-
Bio-fungicide	-	-	-	-
Bio Agents	-	-	-	-
Others (specify)	-	-	-	-
Total	-	-	-	-

## 9.D. Production of livestock materials : Nil

Particulars of Live stock	Name of the breed	Number	Value (Rs.)	Number of farmers to whom provided
Dairy animals	-	-	-	-
Cows	-	-	-	-
Buffaloes	-	-	-	-
Calves	-	-	-	-
Others (Pl. specify)	-	-	-	-
Poultry	-	-	-	-
Broilers	-	-	-	-
Layers	-	-	-	-
Duals (broiler and layer)	-	-	-	-
Japanese Quail	-	-	-	-
Turkey	-	-	-	-
Emu	-	-	-	-
Ducks	-	-	-	-
Others (Pl. specify)	-	-	-	-
Piggery	-	-	-	-
Piglet	-	-	-	-
Others (Pl.specify)	-	-	-	-
Fisheries	-	-	-	-
Fingerlings	-	-	-	-
Others (Pl. specify)	-	-	-	-
Total	-	-	-	-

# PART X – PUBLICATION, SUCCESS STORY, SWTL, TECHNOLOGY WEEK AND DROUGHT MITIGATION

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

(A) KVK News Letter: Kalparuksha
Date of start: January 2013
Periodicity: Quarterly

No. of copies distributed: 300

## (B) Literature developed/published

Item	Title	Authors name	Number
Research papers: 2	Farmers perception on climate change and its impact on agriculture in eastern dry zone of Karnataka  International Journal of Farm Sciences 2013, Vol. 3, No. 2, PP 100 - 107	M.H. Shankar M Shivamurthy Vijay Kumar K.T.	-
	Soil fertility maps of villages as assessment of soil fertility status in different cropping systems of Doddabelavangala Raita samparka Kendra (RSK), Doddaballapura Tq of Karnataka	Roopa V.M D. V. Naveen Mamatha B	
	International Journal of Scientific Research Vol. 3, Issue 4, 2014		
Abstracts published in conference proceedings: 14	Assessment of Mucuna as intercrop in coconut  Conference on Farmers first for conserving soil and water resources in southern region (FFCSWR 2013), Bangalore pp-34	Nagappa Desai B. Mamatha G.M Sujith	-
	A Study on effect of spacing and fertilizer levels on rate of bulb multiplication in Tuberose (Polianthes tuberose) cv.Shringar  Innovations in seed research and development XIII ISST National seed seminar 8-10 June 2013 Bangalore	Nagappa Desai B. Mamatha M.H. Shankar	-
	Assessment of Chilli hybrids with adoption of improved production technology through farmer participatory approach  National Conference on Spices - Recent Advances and Future stratigies, 19 <sup>th</sup> to 21 <sup>st</sup> December, 2013	Nagappa Desai B.Mamatha G. M. Sujith K.R. Shreenivasa M.H Shankar	-

A Study on the impact of watershed programme on	Chandru patil	
Sustainable Crop productivity in micro-watershed area	Nagappa Desai	
of haveri district, Karnataka State	Mamatha. B	
International Conference on Extension Educational		-
Strategies for Sustaianable Agricultural Development- A		
Global perspective, UAS, Bangalore, December 5-8, 2013		
A view on innovative and progressive farmers of Tumkur	Shankar M. H	
district of Karnataka	Sujith, G. M.	
	Srinivasa Reddy K.M	_
International Conference Extension Educational Strategies	Mamatha. H.S.	
for sustaianable agricultural development- A Global	Mamatha. B	
perspective, UAS, Bangalore, December 5-8, 2013	Nagappa Desai	
Evaluation of Bhoochethana facilitators training	Shankara M. H	
programme at Krishi vigyan Kendra, Tumkur	Mamatha H.S.	
	Srinivasa Reddy K.M	
International Conference Extension educational strategies	Nagappa Desai	-
for sustaianable agricultural development- A Global	1	
perspective, UAS, Bangalore, December 5-8, 2013		
Horizantol spread of technologies through demonstrator	Shivalingaiah Y.N	
farmers	Srinivasa Reddy K.M	
iai meis	Nagabhushanam K	
International Conference Extension educational strategies	Shankara M. H	-
for sustaianable agricultural development- A Global	Yashashwini M.A.	
	i ashashwini M.A.	
perspective, UAS, Bangalore, December 5-8, 2013	G. 1 15 77	
Dairy for daily life – a key for sustainable life of the farm	Shankara M. H	
women a case study	Mamatha H.S.	
	Sujith G.M.	_
National seminar on changing scenario of dairy food safety	Srinivasa Reddy K.M	
and standards in the back drop of FSSAI act 2006, Bangalore		
April 26-27. 2013		
Extension strategies for human resource development for	Shankara M. H	
better performance	Vijaya Kumar K.T	
	Harish L	
ISEE national seminar on social dimensions of extension		-
education in holistic development of rural livelihood,		
Lucknow, April 26-27. 2013		
Studies on influence of Physical chemical properties of	B. Mamatha	
soil on growth and yield attributes of Coleus vettiveroides	P.R. Ramesh	
	Nagappa Desai	
Conference on Farmers first for conserving soil and water	Sujith G.M	_
resources in southern region (FFCSWR 2013), March 14 to	J	
16, Bangalore pp-25		
10, Dangaroto pp 20		
	1	

	Screening of Mucuna pruriens var utilis Germplasm for higher seed yield and active principle  Innovations in seed research and development XIII ISST National seed seminar 8-10 June 2013 Bangalore	B. Mamatha T.N. Shivananda	-
	Assessment of Soil test based recommendations adopted by farmers of Tumkur district  International Conference Extension educational strategies for sustainable agricultural development- A Global perspective, UAS, Bangalore, December 5-8, 2013	Mamatha. B Shankara, M. H Nagappa Desai Sujith, G. M	-
	Enhancing soil fertility status in mango orchards through intercropping of legumes  National conference on value change management in Mango, 20 <sup>th</sup> to 22 <sup>nd</sup> March 2014, Hogalagere, Srinivasapura, Kolar district, Karnataka	Mamatha.B Nagappa Desai Shankara. M. H Sujith G. M K. R Shreenivasa Roopa. B. Patil	-
	Integrated Crop Management in Mango  National Conference on Value Change Management in Mango, 20 <sup>th</sup> to 22 <sup>nd</sup> March 2014, Hogalagere, Srinivasapura, Kolar district, Karnataka	K. R Shreenivasa Hanumanthaswamy Rekha D Mamatha B G.M Sujith M.H. Shankara Nagappa Desai Roopa B Patil	-
Technical reports News letters: 04	- Kalparuksha April– June 2013	- Sujith G.M Shankar M.H Nagappa Desai Mamatha H.S Srinivasa Reddy K.M Mamatha B	75
	Kalparuksha July – September 2013	Sujith G.M Shankar M.H Nagappa Desai Mamatha B Mamatha H.S Srinivasa Reddy K.M	75

	Kalparuksha October – December 2013  Kalparuksha January – March 2014	Sujith G.M Shankar M.H Nagappa desai K.R. Shreenivasa B. Mamatha Roopa B Patil Shivappa nayaka H.B Arjuman banu Sujith G.M	75
	Kaiparuksna January – March 2014	Shankar M.H Nagappa desai K.R. Shreenivasa B. Mamatha Roopa B Patil Shivappa nayaka H.B Arjuman banu	75
Technical bulletins:	-	-	-
Popular articles: 09	Integrated farming system by young farmer, Tipturu prabha by weekly, July 27, 2013	Shankara M.H Harish L	-
	Farmers become scientist, Krishi vigyan, quarterly magazine, July – September 2013	M.H. Shankar Mamatha H.S Srinivasa Reddy K.M Arun Kumar S.R	-
	Importance of minor millets and production technologies Krishi vigyan, quarterly magazine, July – September 2013	G.M. Sujith M.H. Shankar Srinivasa Reddy K.M	-
	Production technologies of Vermi compost and its use, Krishi vigyan, quarterly magazine, July – September 2013	Umesh S M.H. Shankar	-
	KVK a hub of agriculture technologies, Krishi vigyan, quarterly magazine, April – june 2013	M.H. Shankar O Kumar L Harish	-
	Importance of minor millets Krishi vigyan, quarterly magazine, April – june 2013	Mamatha H.S M.H. Shankar Srinivasa Reddy K.M	-
	Bale beladu balu bangaravagabeki., Krishi mithra 10 (7):20-25. 2013	Nagappa Desai Chandru Patil Mamatha, B.	-
	Eregobbara, Hasirele mattu jaivika gobbaragala balake- Raitharige vandu ashakirana., Krishi mithra 10 (7):6-11. 2013	Nagappa Desai Chandru Patil Mamatha B	-
	Ranjaka rasagobbarada samartha balake.2013, Krishi Munnudi 26(4): 14-16. 2013	Mamatha B Nagappa Desai.	-

Extension literature	Improved production technologies in Banana	Nagappa Desai	
(Folders): 07	1	Mamatha, B.	
,		M.H. Shankar	
		Shreenivasa K.R.	500
		Sujith G.M	
		Shivappa Nayaka H.B	
		Roopa B Patil	
	Plant protection in coconut	Shreenivasa K.R	
		Nagappa desai	
		M.H. Shankar	
		Sujith G.M	<b>7</b> 00
		Roopa B Patil	500
		Mamatha, B.	
		Shivappa Nayaka H.B	
	Success stories of farmers	M.H. Shankar	
		Sujith G.M	
		Mamatha, B.	
		Shreenivasa K.R	450
		Nagappa desai	450
		Roopa B Patil	
		Shivappa Nayaka H.B	
	Balanced nutrient management for soil management and	Mamatha, B.	
	higher production	Sujith G.M	
		Nagappa desai	
		M.H. Shankar	500
		Shreenivasa K.R	
		Roopa B Patil	
		Shivappa Nayaka H.B	
	Foot and Mouth Disease and its management	Shivappa Nayaka H.B	
		Sujith G.M	
		Roopa B Patil	
		M.H. Shankar	500
		Shreenivasa K.R	
		Nagappa desai	
		Mamatha B.	
	Coconut products and its value addition	Roopa B Patil	
		Mamatha, B.	
		M.H. Shankar	
		Sujith G.M	500
		Shreenivasa K.R	
		Shivappa Nayaka H.B	
		Nagappa desai	

	Soil sample collection and analysis	Roopa V.M <b>B Mamatha</b> D.V. Naveen	250
Others News paper publicity: 82	Training programmes, weather, Pest and Disease forecasting, and other technical information	Team KVK	82
Training manual :	Integrated pest management in Agriculture and Horticulture crops $5^{th}$ - $6^{th}$ September 2013	Dr. Y.N. Shivalingaiah Dr. Srinivasa reddy K.M Mr. M.H. Shankara Dr. G.M. Sujith Mr. Shiva reddy G.N	-
	Integrated nutrient management to improve soil fertility status  15 <sup>th</sup> to 19 <sup>th</sup> July 2013	Dr. B. Mamatha Dr. G.M. Sujith Mr. M.H. Shankara Dr. Nagappa Desai Ms. H.S. Mamatha Dr. K.M. Srinivasa reddy	-
	Improved production technologies and integrated nutrient management in dry land agriculture and Horticulture crops $08^{th}-12^{th}$ July 2013	Mamatha B Shankar M.H Sujith G.M Mamatha H.S Srinivasa Reddy K.M Nagappa Desai	-
	Bhoochethana Karyakramadalli chikkanayakanahalli talukina raita anuvgararige tharabethi 1 – 5th July 2013, KVK, Konehalli	Sujith G.M Mamatha B Shankar M.H Srinivasa Reddy K.M Nagappa Desai Mamatha H.S	-
	Integrated crop management in coconut  29 <sup>th</sup> - 28 <sup>th</sup> September 2013	Srinivasa Reddy K.M Sujith G.M Shankar M.H Mamatha.B Nagappa Desai	-
	Improved coconut cultivation practices and demonstration of coconut climber $18^{th}-23^{rd}\ \ November\ 2013,\ KVK,\ Konehalli$	Nagappa Desai Srinivasa K. R Sujith G. M Shankar M.H Mamatha.B Roopa B Patil Shivappa Nayaka H. B	-

Plant protection in coconut and coconut codevelopment  25 <sup>th</sup> – 30 <sup>th</sup> November 2013, KVK, Koneha  Plant protection in coconut and coconut codevelopment  16 <sup>th</sup> – 21 <sup>st</sup> December 2013, KVK, Koneha	Shankar M.H  Mamatha.B  Roopa B Patil  Shivappa Nayaka H. B  Srinivasa K. R  Sujith G. M  Nagappa Desai  Shankar M.H  Mamatha.B	-
Improved coconut cultivation practices at coconut climber $06^{\rm th}-11^{\rm th}~January~2014~,~KVK,~Konehall$	nd demonstration of  Nagappa Desai Srinivasa K. R Sujith G. M Shankar M.H	-
Improved coconut cultivation practices at coconut climber $10^{\rm th}-15^{\rm th}~{\rm March}~2014~,~{\rm KVK},~{\rm Konehalli}$	nd demonstration of  Nagappa Desai Srinivasa K. R Shankar M.H Sujith G. M	-
Improved coconut cultivation practices at coconut climber $17^{th} - 22^{nd} \text{ March 2014, KVK, Konehall}$	nd demonstration of  Nagappa Desai Srinivasa K. R Shankar M.H Sujith G. M	-
TOTAL		3582

## 10.B. Details of Electronic Media Produced :Nil

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

## 10.C. Success Stories / Case studies, if any (two or three pages write-up on each case with suitable action photographs. The Success Stories / Case Studies need not be restricted to the reporting period).

1. Title: Impact of Training programme on social and economic stability of youths (Group approach)

**Background:** Tumkur district is an land of coconut and accounts an area of 1.5 lakh hectare. With this, recently farmers facing sever labour problem to harvest tender and matured nuts along with the serious pest like Red Palm weevil, Rhinoceros beetle, black headed caterpillar, mites and diseases incidence such as Ganaoderma wilt, stem bleeding, Bud rot etc. with all these the KVK in collaboration with Coconut Development Board, Bangalore and Karnataka State Rural Livelihood Promotion Scheme, GOK organized vocational training programme.

Interventions

**Process:** KVK, Konehalli, Tiptur tq, Tumkur Dist. in collaboration with Coconut Development Board, Bangalore and Karnataka State Rural Livelihood Promotion Scheme, GOK organized 7 (6 days each) vocational training programme on Palm Climbing and Plant Protection under Friends of Coconut Tree (FOCT) programme for self employment for 180 young farmers of the district during the year 2013-14 and 3 programmes 60 young farmers during 2012-13. In each training programme programme schedule, modules and lesson plan were developed to organize the training in more effective and efficient way. The resource persons of our institute along with outside institutes technical persons and local progressive farmers were engaged to take up the technical sessions in the programme. A master trainer who is a ex trainee of our same training programme organized at our centre during the past training programme where he teach the skill of climbing the palm by using climbing equipment. The technical sessions organized in most effective way by using different methodologies and aids including field visits. And more emphasis was given on skill development on palm climbing and plant protection aspects by using systematic method demonstrations.

**Technology:** Training programme on Palm Climbing and Plant Protection

### Impact:

Horizontal Spread: KVK has totally covered 240 young farmers of the district during 2012-13, 2013-14 and under palm climbing and plant protection training programme and eventually they involving in harvesting of their own farm nuts along with engaging in harvesting of nuts from others farm by charging of Rs. 30 per palm. A single trainee can harvest the nuts from 40-50 trees in a day. And on an average 70 trainees are engaging in harvesting of nuts along with crown cleaning including plant protection aspects as a labour and realized the self employment status. KVK with this efforts formed two climbers group such as "Kalpasiri Coconut climbers group", Raysandra, Thuruvekere Tq. And "Kalpaganga Coconut climbers group", Ganganahalli, Thuruvekere Tq. Where in a group approach these groups working most effectively and solving the labours problems to a certain extent.

**Economic gains:** A climber charges Rs. 30 per palm for harvesting of nuts and Rs. 50 for crown cleaning and plant protection aspects. One can earn an handsome income of Rs. 1500-2000 per month along with his daily farming work.

**Employment Generation:** After the training programme KVK has formed two climbers group such as "Kalpasiri Coconut climbers group", Raysandra, Thuruvekere Tq. And "Kalpaganga Coconut climbers group", Ganganahalli, Thuruvekere Tq. Where in a group approach these groups working most effectively and solving the labours problems to a certain extent. Our trainees are also invited by many other KVK's who organized such training programmes to work as a mater trainee, by that also they earning good income.

2. Title: Impact of Training programme on social and economic stability of a young farmer of the District (Individual approach)

**Background:** Tumkur district is an land of coconut and accounts an area of 1.5 lakh hectare. With this, recently farmers facing sever labour problem to harvest tender and matured nuts along with the serious pests like Red Palm weevil, Rhinoceros beetle, black headed caterpillar, mites and diseases incidence such as Ganaoderma wilt, stem bleeding, Bud rot etc. with all these the KVK in collaboration with Coconut Development Board, Bangalore and Karnataka State Rural Livelihood Promotion Scheme, GOK organized vocational training programme.

### **Interventions**

**Process:** KVK, Konehalli, Tiptur tq, Tumkur Dist. in collaboration with Coconut Development Board, Bangalore and Karnataka State Rural Livelihood Promotion Scheme, GOK organized 7 (6 days each) vocational training programme on Palm Climbing and Plant Protection under Friends of Coconut Tree (FOCT) programme for self employment for 180 young farmers of the district during the year 2013-14 and 3 programmes 60 young farmers during 2012-13. In each training programme programme schedule, modules and lesson plan were developed to organize the training in more effective and efficient way. The resource persons of our institute along with outside institutes technical persons and local progressive farmers were engaged to take up the technical sessions in the programme. A master training who is a extrainee of our same training programme organized at our centre during the past training

programme where he teach the skill of climbing the palm by using climbing equipment. The technical sessions organized in most effective way by using different methodologies and aids including field visits. And more emphasis was given on skill development on palm climbing and plant protection aspects by using systematic method demonstrations.

Technology: Training programme on Palm Climbing and Plant Protection

**Impact:** 

**Horizontal Spread**: KVK has totally covered 240 young farmers of the district during 2012-13 and 2013-14 under palm climbing and plant protection training programme and eventually they involving in harvesting of their own farm nuts along with engaging in harvesting of nuts from others farm by charging of Rs. 30 per palm. A single trainee can harvest the nuts from 40-50 trees in a day. And on an average 70 trainees are engaging in harvesting of nuts along with crown cleaning including plant protection aspects as a labour and realized the self employment status.

**Economic gains:** A climber charges Rs. 30 per palm for harvesting of nuts and Rs. 50 for crown cleaning and plant protection aspects. One can earn an handsome income of Rs. 1500-2000 per month along with his daily farming work.

Employment Generation: A Mr. Nataraju, marginal farmer with land holding of 1 acre dry land and before attending the training programme he was engaged in masonry work and with a savings of Rs. 200-250 per day. By the advertisement of KVK regarding training programme he attended the training programme on Palm climbing and Plant Protection during September 2013. He was actively involved in all the activities of training programme during sessions of one week. After training programme he went back to his native and tried lot about more skill on palm climbing himself and after that he is fully engaged in palm climbing by leaving masonry work. Earlier days KVK has given advertisement about his work in the daily news paper and magazines and Mr. Nataraju also prepared visiting cards of his profile. By all these efforts now Mr. Nataraju is more demanding person in the District and neighbor districts for harvesting of Coconuts and Crown cleaning along with plant protection work. Now he is fetching an income of Rs. 800-1000 daily by deducting all other expenditures. He also involved other trainees who got training at our KVK for harvesting of nuts when ever the more demands comes. Mr. Nataraju proudly says that, the KVK has given good and more effective training programme where it changes my life style by improving the economic status and because of all these I cleared the loan of Rs. 25,000/- and purchased new motor cycle and am happy now.

### 3. Title: Improved Dairy Farming

### **Background:**

Name of the farmer	:	Mahendra S/o Jnanamurthy Mathihalli, Tiptur (Tq) Tumkur Dt. Karnataka Ph. No:9945310841
Age (years)	:	27
Education (Highest level and subject)	:	PUC
Land holding	:	8 acres
Crops grown	:	Cereals, Horticulture crops, fodder crops
Livestock (Cow, buffalo etc in number)	:	40 cow,

### Intervention

**Process:** Mr. Mahendra is an young progressive farmer has land holdings of 8 acres. He is involved in cultivation of different Agriculture and horticulture crops. He adopted improved dairy farming and growing fodder crops such as B.H 18, CO 3 and MP chari in an area of 3 acres and ragi in an area of 3 acres.

**Technology:** Rearing high milk yielding 40 (HF and Jersy cows) and milking by using machine.

### **Impact**

Horizontal Spread: He has adopted improved dairy farming. Nearly 500 farmers have visited his dairy shed and adopted the same technologies in their Dairy farming

**Economic Gains:** Daily he is getting nearly 300 lts of milk and fetching on an average Rs. 6,000 daily. Annually from crops and Dairy farming he is getting annual income of Rs. 3,00,000/-

**Employment Generation:** He is providing employment opportunities to 3-4 labours .

**4. Title:** Diversified Farming System

### **Background:**

Name of the farmwomen	:	Pankaja w/o Mr. Chandra Shekar Siddanakatte, Ramanahalli (Pt) Kandikere Hobli Chikkanayakanahalli (Tq) Tumkur Dt. Karnataka 09986729926
Age (years)	:	48
Education (Highest level and subject)	:	SSLC
Land holding	:	25 acres
Crops grown	:	Cereals, Horticulture crops, medicinal plants.
Livestock (Cow, buffalo etc in number)	:	1 cow, 1 calf, 2 ducks, 2 turkey and backyard poultry

### Intervention

**Process:** Mrs . Pankaja , a progressive farm women have land holdings of 25 acres. She is involved in cultivation of different horticulture crops such as arecanut, coconut, banana ; spices like pepper, turmeric etc, flower crops like jasmine, rose, crossandra etc., and also grows some medicinal crops like aleovera, brahmi, lemon grass etc.,

**Technology:** With involvement of KVK Tumkur and the line departments she is growing improved varieties of Agricultural and horticultural crops and livestock. She is adopting improved agriculture technologies in plantation crops like arecanut and coconut. She owns plate and cup making machine, biodigester, brick making machine, arecanut dryer, arecanut bagging equipment, flour machine, coconut oil extractor.

### **Impact**

**Horizontal Spread:** She has adopted Integrated Farming System along with use of farm machinery and Processing Equipments. Nearly 1000 farmers have visited her farm and adopted the same technologies in their farms **Economic Gains:** From all these activities she approximately earns 8-10 lakhs/annum.

**Employment Generation:** She is providing employment opportunities to 5-6 labours .

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

**1. Title:** Rat control in Plantation trees using local rat traps **Background:** 

Name of the farmer	:	Mr. Arun Kumar, S. R Shettikere Chikkanayakanahalli (Tq) Tumkur Dt. Karnataka
Age (years)	:	35
Education (Highest level and subject)	:	B.Sc
Land holding	:	8 acres
Crops grown	;	Cereals, Horticulture crops.
Livestock (Cow, buffalo etc in number)	;	1 cow, 1 calf,

### Intervention

**Process:** Mr. Arun kumar from Tumkur district Karnataka,, a young progressive farmer have land holdings of 8 acres. He is involved in cultivation of different Agriculture and horticulture crops such as arecanut, coconut, banana. Rats pose a major challenge to agriculture, especially after monsoon season. The rodents are major problem during crop growth in the field and during post harvest storage, as they consume and contaminate stored food.

They also infect livestock feeds, kill poultry and consume their eggs.

**Technology:** The trap designed by Mr. Arun kumar is a binding wire which is tied to the four corners of an old bamboo basket and connected to a single plastic thread. The plastic thread is attached to a coconut front that can be pulled up for down. A snap trap is placed inside the bamboo basket and a chopped coconut kernel piece attached to it.

### **Impact**

**Horizontal Spread:** It is low cost technology that promises to provide a good result. Grass root level technology and methodologies developed by Mr. Arun kumar benefits several farmers and has been accepted across the region. Nearly 3000 farmers were adopted this low cost technology throughout the state.

Economic Gains: On an average 1500 traps were sold @ Rs. 30 per trap. A single trap can catch upto 15-20 rats daily and 3000 -4000 nuts saved from damage from his 8 acres of land

Employment Generation: This technology can save the labour cost by manual control of rats .

### Scientists – Farmer Interaction

The scientists of Krishi Vigyan Kendra, Tumkur Visited the farm of Mrs. Rekha, Bannihalli (Pt) Tiptur (Tq), Tumkur Dt, Karnataka and interacted (Face to Face interaction) regarding the Experience of Mrs. Rekha in Integrated Farming System and suggested the Problem solving strategies to overcome some difficulties in IFS. For past 5 years she is involved in Integrated

Farming System for sustainable agriculture development. Before venture into IFS both husband and wife were employees of Govt. institute. They have passion for agriculture and started involving different activities in farm to get higher yield and income. She involves herself in IFS activities like growing of coconut, arecanut, banana, sapota, cardamom, clove, pepper, citrus species and forest trees like Jatropa, teak, etc in an area of 3.09 acres and also involving in dairy farming. In free time she engages herself in education / tuition up to 10<sup>th</sup> standard regarding general knowledge, and educated upto an extent of 500-700 farmers on IFS and ITK's. She is also involved in vermicomposting and practices rain water harvesting in house and in field implements water saving techniques such as drip and sprinkler irrigation.

### Snails management in horticulture garden through participatory approach.

Snails are becoming serious pests of horticultural crops like Arecanut, coconut, banana, brinjal, tomato, chilies, jasmine, aster. This pest is causing economic damage to all these horticultural crops. Farmers locally control the pest using common. Salt and some of them use metaldehyde that is not available in right time and harmful to pest and children in the vicinity and also cost intensive.

Crop damage is severe especially in Hemavathi canal areas and poor adoption of the technology against the snails as it requires/demands group participation results in severe damage to horticulture crops

### Refinement of Existing technologies.

Hence, it was proposed to refine the existing technologies.

### Alternatives

In order to suitably refine the existing technologies, the following alternatives were formulated by the scientists themselves in consultation with other specialists.

- T1: Farmers not adopting any control measures
- T2: Farmers use metaldehyde for snail management
- T3: Slightly ripened papaya, Guava, banana, ricebran bait only. Technology is cost effective and organic farmers come foreward to use the technology option. Snails have to be collected manually and destroy.
- T4: Papaya/ Rice brain bait with 10 gms of methomyl in bait kills them.

### Implementation of the programme

A training programme on snails management was organized at chikkanahalli Sira taluk and Mathihalli, Tiptur taluk to educate the farmers about management of snails.

In this training programme, KVK scientists stressed the importance of group approach and conducted the demonstration with all alternatives and explained about cost-benefit ratio of each technology

### **Farmers opinion**

All the participants expressed their view about using metaldehyde, using slightly ripened fruits like papaya, banana and hand picking and using ripened fruits with methomyl( lante) as bait.

Farmers opined that using ripened fruits with hand picking is low cost and ecofriendly management practices(Rs. 500/ha) followed by using ripened fruits with methomyl (Rs 1600/ha) and metaldehyde chemicals (Rs 6800/ha)

#### Communication of the technology

The message that the low cost efficient and eco-friendly management technologies involving ripened fruits without baits and with baits can be effectively utilized for management of snails was communicated to the field level functionaries of the line departments using various channels such as the research extension interface, zonal workshop, training programme etc. About 85 farmers who adopted the technology during 2010-11 in an area of 220ha

10.E. 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	Paddy/Ragi	Seedlings were transplanted equi distance at spacing of 22.5 x 22.5cm	It facilitates intercultivation in both directions, conserves moisture, controls weeds and enhance tillering
2	Ragi	Sowing seeds mixed with FYM	It ensures better moisture and nutrient supply and reduces seed rate and finally lesser cost of production
4	Coconut	Application of common salt	Cost effective substitute for potash and also acts as or insect repellent
		Planting cactus near tree	To control stem bleeding
5	Arecanut	Application of Tank silt @ 50ton/ha	Supply nutrient to crop
6	Paddy	Calotropies(yekka) branches are placed at the water inlet	Acts as a insect repellent
7	Coconut	Root feeding with neem oil	Reduce stem bleeding
8	Coconut	Planting kalli plants at the base of coconut palm	Reduce stem bleeding
9	Perennial crops	Rag husk, coconut fronds and husk are used as mulch	Check evaporation and weed growth
10	Redgram	Redgram is mixed with castor oil and stored in earthen vessel	Physical barrier to pests
11	Vegetable garden	Maize is grown around vegetable garden	Physical barrier to cattle and acts as a trap crop for insects

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

- Identification of courses for farmers/farm women
  - > PRA technique and need analysis through individual & group discussion
  - ➤ As per the suggestions of members of SAC
  - > Based on discussion at Bimonthly work
    - Rural Youth

- ➤ Survey & discussion
- > Feedback from bankers
- Service Personnel
- > Discussion with District and taluk level officers to know the areas of interest/choice of extension workers based on field problems
- > Deliberations of Bi monthly technical workshop
- > SAC interactions
- Diagnostic visits

#### 10.G. Field activities

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

#### 10.H. Activities of Soil and Water Testing Laboratory

**Status of establishment of Lab** : Good

1. Year of establishment : 17-12-2005

#### 2. List of equipments purchased with amount

Sl. No.	Equipments / Instruments	Quantity (no.)	Cost (Rs.)		
1	pH meter	01	8550.00		
2	Conductivity bridge	01	7400.00		
3	Physical Balance	01	12,000.00		
4	Chemical Balance	01	48,900.00		
5	Magnetic stirrer with Hot Plate	01	5500.00		
6	Shaker with DC Motor	01	27,600.00		
7	Hot Air Oven	01	20,000.00		
8	Water Distillation Still	01	48,850.00		
9	Spectrophotometer	01	46,200.00		
10	Flame Photometer	01	38,720.00		
11	Kjeldahl Digestion and Distillation Setup	01	1,67,709.00		
12	LG Refrigerator with Stabilizer and Stand	01	15,970.00		
13	Kanchan Mixer Grinder	01	1800.00		
	TOTAL Rs. 4,49,199.00				
14. Unde	the laboratory setup: The following accessories were purchased				
a	Fume cupboard with shutter and blower	1	61,875.00		

b	Laboratory tables: One table with Kadapa stone on top, size-10' x 3', One table with wooden top,	3	16,000.00
	size-8' x 3', One table with plywood top & compartments, size -8'x 3'		
С	Showcase boxes	2	11,000.00
d	61/2' x 3' Steel almirahs with glass fitted doors	4	27,450.00
e	61/2' x 3' Steel almirahs without glass fitted doors	4	22,950.00
f	Office tables Size- 2 1/2' x 4 1/2'	1	3994.00
g	Office tables Size- 3' x 5'	1	4725.00
h	S - type chairs	5	3263.00
i	Steel rack	4	5848.00
j	Stools	5	1500.00
k	Exhaust fans	2	1688.00
1	Mesh work for laboratory rooms		1775.00
m	3-phase power connection to fume wood for running the motor (including labour charges)		3377.00
n	40 mm slab for the construction of platform for placing the fume hood (including labour charges)		4269.00
0	Hotplate (rectangular type) - 12' x 18'	1	10,800.00
p	Painting materials & labour charges (for painting laboratory & office rooms & wooden almirahs &		3976.00
	tables)		
q	Extension cords	3	2400.00
r	Aluminum partition for the Laboratory	1	10,000.00
	TOTAL	_	Rs. 1,96,890.00
	GRAND TOTAL (1 to 14)	·	Rs. 6,46,089.00

## **B.** Under Recurring contingency:

Sl. No.	Particulars	Cost (Rs.)
1	Chemicals	44,695.00
2	Glassware	1,35,417.00
3	Petty Items: Gas connection for spectrophotometer with stove and other accessories (1+1), Subble, Pick axe, Mumties, Bondless, Lock Covers, 35 mm locks, Stationeries, Plastic items, Cloth Bags, etc. List of Soil sampling augers and other laboratory accessories purchased: Soil Sampling augers, Standard Test Sieves, Mortar and Pestle, Burette Stand with Clamp, Spatula, Wash Bottles, Agate Mortar and Pestle, Gloves, Paper Tissue Roll, Bunsen Burners, Porcelain Crucible, Funnels, Reagent Bottles, Tongs, Burner Stands, Litmus Papers, pH Papers, Hamato Balance, etc	35,995.00
4	Soil and plant sample processing and storage facility: Plywood Almirahs with glass doors and compartments, wall box with compartments and front glass door fittings, Laboratory platform partition, Wooden table with compartments and Wooden pestle and mortar.	44,100.00
GRAN	ND TOTAL	2,60,207.00

#### Details of samples analyzed so far since establishment of SWTL:

Details	No. of Samples analyzed	No. of Farmers benefited	No. of Villages	Amount realized (Rs.)
Soil Samples	3780	3780	1856	189000
Water Samples	2982	2982	1874	298300
Plant samples	-	-	-	-
Manure samples	-	-	-	-
Others (specify)	-	-	-	-
Total	6762	6762	3730	487300

#### Details of samples analyzed during the 2013-14:

Details	No. of Samples analyzed	No. of Farmers benefited	No. of Villages	Amount realized (Rs.)
Soil Samples	589	560	362	29450
Water Samples	588	565	343	58800
Plant samples	-	-	•	-
Manure samples	-	-	•	-
Others (specify)	-	-	•	-
Total	1177	1125	705	88250

## 10.I. Technology Week celebration during 2013-14 Yes/No, If Yes: No

Period of observing Technology Week: Total number of farmers visited :

Total number of agencies involved :

Number of demonstrations visited by the farmers within KVK campus:

#### Other Details

Types of Activities	No. of Activities	Number of Farmers	Related crop/livestock technology
Gosthies	-	-	•
Lectures organized	-	-	
Exhibition	-	-	•
Film show	-	-	•
Fair	-	-	•
Farm Visit	-	-	•
Diagnostic Practical's	-	-	•
Supply of Literature (No.)	-	-	•
Supply of Seed (q)	-	-	•
Supply of Planting materials (No.)	-	-	•
Bio Product supply (Kg)	-	-	
Bio Fertilizers (q)	-	•	•

Types of Activities	No. of	Number of	Related crop/livestock technology
	Activities	Farmers	Related Crop/nvestock technology
Supply of fingerlings	-	-	•
Supply of Livestock specimen (No.)	-	-	•
Total number of farmers visited the	-	-	•
technology week			

## 10. J. Interventions on drought mitigation (if the KVK included in this special programme): No

#### A. Introduction of alternate crops/varieties

State	Crops/cultivars	Area (ha)	Number of beneficiaries	
-	-	=	-	

## B. Major area coverage under alternate crops/varieties

Crops	Area (ha)	Number of beneficiaries
Oilseeds	-	-
Pulses	-	-
Cereals	-	-
Vegetable crops	-	-
Tuber crops	-	-
Total	-	-

## C. Farmers-scientists interaction on livestock management

State	Livestock components	Number of interactions	No.of participants
-	-	-	-
-	-	-	-
Total	-	-	-

#### D. Animal health camps organized

State	Number of camps	No.of animals	No.of farmers
-	-	-	-
-	-	-	-
-	-	-	-

#### E. Seed distribution in drought hit states

State	Crops	Quantity (qtl)	Coverage of area (ha)	Number of farmers
-	-	-	-	-
-	-	-	-	-

## E. Large scale adoption of resource conservation technologies

State	Crops/cultivars and gist of resource conservation technologies	Area (ha)	Number of
	introduced		farmers
-	•	1	-
-	-	-	=
-	-	-	-

## F. Awareness campaign

State	Meetings		Gosthies		Field day	7S	Farmers fair		Exhibition		Film sho	W
	No.	No.of	No.	No.of	No.	No.of	No.	No.of	No.	No.of	No.	No.of
		farmers		farmers		farmers		farmers		farmers		farmers
=	-	-	-	-	-	-	-	-	-	-	-	-
-	-	-	-	-		-			-			
Total	-	-	-	-			-			-		

#### PART XI. IMPACT

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

Name of specific	No. of	% of adoption	Change in in	come (Rs.)
technology/skill transferred	participants		Before (Rs./Unit)	After (Rs./Unit)
Introduction of Tanu paddy with pest & disease management	49	41.00	8,500	15,400
Introduction of GPBD-4 and RHC management	33	31.00	2,700	3925
Introduction of BRG-1 and pod borer management in redgram	53	38 %	6,000	9,200
Sunflower budnecrosis management with KBSH-41 hybrid	31	27.00	12,750	15,850
Preparation of Ragi malt	212	24.00		Rs 180/month
Introduction of MR-6 with biofertilizer	83	46.00	3,850	6300
Pest management in Bengalgram and introduction of JG-11	27	34.00	9,700	12,150
Introduction of Saame	21	29	1500	3,800

#### 11.B. Cases of large scale adoption

#### A. Introduction of BR-2655 paddy variety in Tumkur district-Successful case study

## **Background:**

Paddy being the major cereal crop of the district occupies about 29,818 ha area with the productivity of 46.09 q/ha. The productivity is low as compared to national and state productivity. This could be attributed to use of local varieties, poor management of nutrients, pest and disease. To know the percentage parameter contribution for low productivity, KVK conducted a preliminary survey by means of group meetings, discussions, field visit and other techniques. The parameters were found to be

#### a)Agronomical management:

use of local varieties, poor land preparation, no seed treatment with bio fertilizer or chemicals, transplanting more number of seedling and use of aged seedlings, always flooding with water, imbalanced use of nutrients, non application of potassium and micro nutrients results in yield reduction.

#### b) Pest and disease management

Among pest, major were incidence of stem borer, leaf folder and sucking insects. In diseases blast is sever and in the last 3 years almost 30-40% area was severely affected by the diseases and results in yield loss.

#### Intervention of KVK

In the year 2002-03, KVK has conducted one OFT on blast management and during 2005-06, KVK has also conducted OFT on integrated nutrient management. Wherein, for the first time KVK has tried BR-2655. Further in the year 2006-07, the OFT tried was on Sri Method of paddy cultivation and the same OFT was continued

in 2007-08 along with OFT on "sustainability in yield through effective water management. Hence KVK has given lot of importance for testing the suitability andfeasibility of paddy techniques in the district.

Looking to the severity of regular infestation of blast and its rapid increase and spread in the district, KVK Tumkur in the I PHASE gave training the farmers in villages where there was severe incidence of blast and has created awareness on the disease occurrence, identification of the disease and its effective control In the II PHASE, KVK has conducted Front Line Demonstrations using BR 2655 variety with production technologies.

The characteristics of BR 2655 are

- a) long duration (140 to 145 days)
- b) tall variety and high fodder yielder
- c) blast tolerant
- d) low susceptibility to lodging

#### A. Redgram (BRG -1)- Boon for dryland

#### **Background:**

In Tumkur district, almost 80% of the area is under rainfed and receives an average rainfall 540 mm per year. Among the pulses, farmers are growing greengram, blackgram in pre-monsoon, horsegram in late kharif and redgram in regular monsoon period the redgram being hardy and drought tolerant pulse was able to integrate into the existing cropping system both sole as well as intercrop. Owing to poor returns of other agronomical pulse crops farmers have largely adopted redgram as major pulse crop in drylands of the district.

Redgram is an important pulse crop and its grown in 12,595 ha area with a productivity of 691 kg/ha. The achieved productivity is less than state productivity (800 kg/ha) and national productivity(925 kg/ha). The farmers of the district are getting low yield /unit area due to non adoption of improved varieties, improved production techniques and improper IPM measures

#### **Intervention of KVK:**

KVK intervention has led to the awareness of BRG-1 variety, an improved variety evolved by UAS, Bangalore during 2004. The exhaustive efforts through extension activities like training and demonstrations, the BRG-1 variety is getting popular through out the district. In the first PHASE, KVK, Tumkur has created the awareness of farmers regarding new improved varieties and IPM measures. In the 2<sup>nd</sup> PHASE, KVK conducting Front Line Demonstrations where technologies demonstrated are

- 1. Introduction of BRG-1 variety
- 2. Use of biofertilizer particularly rhizobium and PSB
- 3. Plant protection measures using pheromone traps @ 8-10 traps/ha, spraying of NPV@ 250 LE/ha
- 4. and spraying of ekalux against redgram pod borers)

There is a very good response from farmers regarding the use of BRG-1 variety. BRG-1 variety is having duration of 170-180 days, suitable for vegetable purpose and a high yielder. The farmers who are cultivating in lands nearly towns or cities, are getting more income as they can sell the immatured red gram pods easily and on an average they get minimum of Rs. 20/kg and each red gram plant can give 20 kg green pods since the red gram crop is highly suitable for intercalating for conservation of soil and moisture, KVK Tumkur has conducted OFT's on

1. Redgram + Sunflower(1:2)

2. Redgram + Sesamum(8:2) after the harvest of sesamum sowing of horse gram can be done.

In these OFT's, the total income from these intercropping are very high when compared to sole crop of red gram and other crops. For accuracy and consistency, the above OFTs were continued in 2010-11 and frontline demonstration 2011-12 takenup. Now the farmers are also getting higher profit of Rs. 15,000 per acre through cultivation of sole redgram as compared to earlier profit of Rs. 6000. Thus KVK, Tumkur has become the prime source of technology in the district for BRG-1 and improved cultivation practices

#### **Success story**:

Sri Maridevaru is a progressive farmer, aged 58 years, is having regular contacts with staff of line departments and KVK. He is a resident of Yellapura, Tumkur taluk. He along with 25 farmers of Yellapura and surrounding villages attended programme of KVK, Konehalli, Tumkur Dt. During training programme, lot of discussion and exchange of views about various technologies were held between farmers and scientists. It came to the notice that, farmers are growing local seeds (own seeds) of redgram and are getting only 7-8 q/ha, due to own seeds, pest incidence and uneven distribution of rainfall in May and june. Hence, KVK, Konehalli, Tumkur Dt suggested an alternative of growing BRG-1 red gram variety which yields better. In this regard, KVK decided to implement front line demonstration on redgram variety BRG-1

#### Expenditure and income statement per ha.

Particulars	Farmers practice	Recommended practice
Yield (Q/ha.)	9.65	14.50
Cost of cultivation (Rs./ha.)	16,300	18,000
Gross income (Rs./ha)	21,230	43,500
Net income (Rs.)	4,930	25,500
B:C Ratio	1.30	2.4

He has got about 30 q. from 2 ha. And sold the seed material during kharif 2009 at the rate of Rs.30.kg and he has got Rs. 90,000. He has distributed seeds to nearly 250 farmers of Tumkur and Chitradurga dt. covering nearly 480 acres of area under BRG-1 and generated higher income. By looking at his success of earning more profit, about 150 farmers were motivated and started cultivation of BRG-1 variety in 100 ha. In neighbouring villages during kharif 2011.

11.C. Details of impact analysis of KVK activities carried out during the reporting period

Intervention of technology (2011-12)	Outcome (2012-13)	Horizontal spread (2013-14)		
Redgram	1) Increase in area upto 500 ha under BRG – 1	1) Increase in area was 450ha under BRG-1		
-Introduction of BRG-1 variety and pest	2) Pest management through eco friendly IPM to save cost	2) Increase in yield was 8% due to variety and IPM practices		
management	3) Increase in yield by 15%			
Vermicompost	1)Creating additional income generating opportunities for rural	Technologies disseminated through training and		
-Scientific production of vermicompost	youth and women	demonstration to farm women and rural youth		
	2) Increase in income of Rs 400 per month per individual	2) Members started vermi compost production by obtaining		
		assistance from line department		
Training programme on Palm Climbing	Formation of palm climbers associations	Reduction in the labour problem up to 10-15 % for harvest of		
and plant protection (FOCT)	Kalpatharu palm climbers associations	tender and matured nuts along with crown cleaning		
	Kalpasiri palm climbers associations	Self employment		
		Increase in the additional income by Rs. 1000-1500 per		
		month		

## **PART XII - LINKAGES**

## 12.A. Functional linkage with different organizations

Name of organization	Nature of linkage
State Department of Agriculture, Tumkur Dist.	Conducting training programmes, Frontline Demonstrations, On Farm Testing
	and field days
State Department of Horticulture, Tumkur Dist.	Conducting training programmes, FLD's field visit
State Department of Animal Husbandry & Veterinary Services, Tumkur	Conducting Animal Health Camps, Training for Veterinary Officers & farmers
Department of Women & Child Welfare, Tumkur Dist.	Joint diagnostic survey, Conducting training to women Self Help Groups organizing programmes like nutrition week,world food day etc.
Department of Microbiology, UAS, Bangalore	Supplied Rhizobium, PSB, Azospirillum for FLD's and OFT's Supplied Fertilizers, Gypsum, Neem Cake chemicals for FLD's and OFT's
Taluk Agricultural Produce Co-operative Marketing Society (TAPCMS), Tiptur, Arsikere.	Training for Womens, Child Health campaign Conducting training programmes to the farmers/farm women
General Hospital, Tiptur	Conducting training programmes to the Department officials, NGO's and farmers and financial aid for conducting training programmes
Gram Panchayats	Technical information and critical inputs for FLD's and OFT's
Department of Watershed, Tumkur	Demonstrations and trainings
	Conducting training and demonstration
IIHR, Hesaraghatta, Bangalore	
Zuari Industries Ltd. Tumkur	
ORDER, NGO, Tumkur	

## 12.B. List Externally Funded Projects / schemes undertaken by the KVK and operational now, which have been financed by State Govt./Other Agencies: Nil

Name of the scheme	Role of KVK	Date/ Month of initiation	Funding agency	Amount (Rs.)
-	•	-	-	-

## 12.C. Details of linkage with ATMA:

a) Is ATMA implemented in your district Yes/ No : Yes

If yes, role of KVK in preparation of SREP of the district? : Technical guidance was provided in preparation of SREP. Now, KVK staff are involved in revisiting of SREP programme under ATMA

## Coordination activities between KVK and ATMA during 2013-14

S. No.	Programme	Particulars	No. of programmes attended by KVK staff	No. of programmes Organized by KVK	Other remarks (if any)
01	Meetings	-	-	-	-
	Research projects				Demonstrations (16 Nos) &
		Integrated Management of			Training Programmes (5 Nos) as
02		Rhinoceros beetle and Red palm	-	-	well other educational activities
		weevil in coconut			were carried out as a part of the
					short term research project
03	Training programmes		8	-	
04	Demonstrations	-	-	16	-
05	<b>Extension Programmes</b>	-	-	-	-
	Kisan Mela	-	-	-	-
	Technology Week	-	-	-	-
	Exposure visit	-	-	-	-
	Exhibition	-	-	-	-
	Soil health camps	-	-	-	-
	Animal Health Campaigns	-	-	-	-
	Others (Pl. specify) field		5	-	
	days	-	5		-
06	Publications		-	-	-
	Video Films		-	-	-
	Books		-	-	-
	Extension Literature		-	-	-
	Pamphlets		-	-	-
	Others (Pl. specify)		-	-	-
07	Other Activities (Pl.				-
U7	specify)	-	-	-	
	Watershed approach	-	-	-	-
	Integrated Farm				-
	Development	-	-	-	
	Agri-preneurs development	-	-	-	-
		-	-	-	-

## 12.D. Give details of programmes implemented under National Horticultural Mission : Nil

S. No.	Programme	Nature of linkage	Funds received if any Rs.	Expenditure during the reporting period in Rs.	Constraints if any
-	-	-	-	-	-

## 12.E. Nature of linkage with National Fisheries Development Board : Nil

S. No.	Programme	Nature of linkage	Funds received if any Rs.	Expenditure during the reporting period in Rs.	Remarks
-	-	-	-	-	-

## 12.F. Details of linkage with RKVY: Nil

S. No.	Programme	Nature of linkage	Funds received if any Rs.	Expenditure during the reporting period in Rs.	Remarks
-	-	•	•	•	-

## 12. G Kisan Mobile Advisory Services

Month	No. of SMS sent	No. of farmers to which SMS was sent	No. of feedback / query on SMS sent
April 2013	-	-	-
May 2013	-	-	-
June 2013	-	-	-
July 2013	-	-	-
August 2013	-	-	-
September 2013	8	2830	-
October 2013	20	10307	-
November 2013	12	5048	-
December 2013	16	3375	-
January 2014	7	1529	-
February 2014	15	3308	-
March 2014	13	3555	-
Total for the year 2013-14	91	29952	-

## PART XIII- PERFORMANCE OF INFRASTRUCTURE IN KVK

## 13.A. Performance of demonstration units (other than instructional farm)

Sl.		Year of	Area		Deta	ils of production	Amoun	t (Rs.)	ъ.
No.	Demo Unit	establishment	(ha)	Variety	Produce	Qty.	Cost of inputs	Gross income	Remarks
1	Model horticulture nursery	2010-11	0.09	IIHR / UAS (B) / Private		\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	45,500	1,54,256	-
			·		Total	·		_	

## 13.B. Performance of instructional farm (Crops) including seed production

Name			g 🔾	D	etails of production		Amour	nt (Rs.)	
of the crop	Date of sowing	Date of harvest	Area (ha)	Variety	<b>Type of Produce</b>	Qty. (Kgs)	Cost of inputs	Gross income	Remarks
Cereals & millets									
Finger millet	24-07-2014	05-12-2013	2.4	MR – 1	Seed	3000	-	75000	
Little millet	23-08-2013	06-12-2013	2.4	OLM – 203	Seed	1175	-	56250	
Pulses									
Redgram	04-06-2013	27-12-2013	2.4	BRG – 1	Seed	975	-	43875	
Oilseeds	-	-	-	-	-	-	-	-	-
Fibers	-	-	-	-	-	-	-	-	-
Spices &	-	-	-	-	-	-	-	-	-
Plantation crops									
Floriculture	-	-	-	-	-	-	-	-	-
Fruits	-	-	-	-	-	-	-	-	-
Vegetables	-	-	-	-	-	-	-	-	-
Others (specify)	-	-	-	-	=	-	-	-	-

## 13.C. Performance of production Units (bio-agents / bio pesticides/ bio fertilizers etc.,): Nil

Sl.			Amou	int (rs.)	_
No.	Name of the broduct   City		Cost of inputs	Gross income	Remarks
-	-	-	-	-	-
-	-	-	-	-	-

## 13.d. Performance of instructional farm (livestock and fisheries production) :Nil

Sl.	Name	Details of production			Amou	nt (Rs.)	
No	of the animal / bird / aquatics	Breed	Type of Produce	Qty.	Cost of inputs	Gross income	Remarks
-	=	=	-	-	-	-	-
-	=	-	-	-	=	-	-

## 13.E. Utilization of hostel facilities

Accommodation available (No. of beds): 30

Months	No. of trainees stayed	Trainee days (days stayed)	Reason for short fall (if any)
April 2013	-	-	-
May 2013	29	2	
June 2013	-	-	-
July 2013	89,50	5 days, 2 days	-
August 2013	20, 21, 28	3 days, 2 days, 2 days	-
September 2013	30, 33, 21	2 days, 2 days, 6 days	-
October 2013	18	3 days	-
November 2013	27, 21, 21	1 day, 6 days, 6 days	-
December 2013	15, 23, 12, 28, 21	1 day, 2 days, 1 day, 1 day, 6 days	-
January 2014	35, 49, 67, 47, 145, 48, 21	1 day, 1 day, 1 day, 1 day, 1 day, 6	-
		days	
February 2014	19, 33	1 day, 2 days	-
March 2014	22, 42, 42, 60, 107, 123	2 days, 6 days, 6 days, 1 day, 1 day, 1 day	-

#### 13.F. Database management

S. No	Database target	Database created
1	OFT, FLD	Created
2	Soil Testing results database	Created
3	KMAS message service Database	Created
4	Weather database	Created

## 13.G. Details on Rain Water Harvesting Structure and micro-irrigation system: Nil

Amount sanction (Rs.)	Expenditure (Rs.)	Details of infrastructure created / micro irrigation system etc.	Activities conducted				Quantity of water harvested in '000 litres	Area irrigated / utilization pattern	
			No. of Training programmes	No. of Demonstration s   materials   farmers   3.					
-	-	-	-	-	-	-	-	-	-
-	-	-	-	-	-	-	-	-	-

## PART XIV – FINANCIAL PERFORMANCE

#### 14.A. Details of KVK Bank accounts

Bank account	Name of the bank	Location	Branch code	Account Name	Account Number	MICR Number	IFSC Number
With Host Institute (ICAR)	Canara Bank	Tiptur	699	SB	0699101022252	572015202	CNRB0000699
With KVK (Revolving fund)	Canara Bank	Tiptur	699	SB	0699101025795	572015202	CNRB0000699

## 14.B. Utilization of KVK funds during the year 2013-14 (Rs. In lakh)

S. No.	Particulars	Sanctioned	Released	Expenditure
A. Rec	curring Contingencies	1	1	
1	Pay & Allowances	4700000	4700000	4700000
2	Traveling allowances	160000	160000	159864
3	Contingencies			
A	Stationery, telephone, postage and other expenditure on office running, publication of Newsletter and library maintenance (Purchase of News Paper & Magazines)	250000	250000	239647
В	POL, repair of vehicles, tractor and equipments	190000	190000	189921
C	Meals/refreshment for trainees (ceiling upto Rs.40/day/trainee be maintained)	76000	76000	76092
D	Training material (posters, charts, demonstration material including chemicals etc. required for conducting the training)	60000	60000	60000
E	Frontline demonstration except oilseeds and pulses (minimum of 30 demonstration in a year)	330000	330000	334013
F	On farm testing (on need based, location specific and newly generated information in the major production systems of the area)	50000	50000	49980
G	Training of extension functionaries	14000	14000	13071
Н	Maintenance of buildings	45000	45000	45000
Ι	Establishment of Soil, Plant & Water Testing Laboratory			
J	Library	5000	5000	4903
K	Extension Activities	45000	45000	44113
L	Farmers' Field School	28000	28000	27996
	TOTAL (A)	5953000	5953000	5944600
B. Nor	n-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)			
TOTA	· /	0	0	0
C. RE	VOLVING FUND	0	0	0
GRAN	D TOTAL (A+B+C)	5953000	5953000	5944600

## 14.C. Status of revolving fund (Rs. In lakh) for the three years

Year	Opening balance as on 1st April	Income during the year	Expenditure during the year	Net balance in hand as on 1 <sup>st</sup> April of each year
April 2011 to March 2012	5,37,617	13,00,594	14,60,805	3,77,406
April 2012 to March 2013	3,77,406	12,97,753	11,58,131	5,17,028
April 2013 to March 2014	5,16,528	18,13,094	15,14,479	8,15,143

#### 15. Details of HRD activities attended by KVK staff during 2013-14

Name of the staff	Designation	Title of the training programme	Institute where attended	Dates
Dr. Mamatha B	SMS (SS & AC)	Induction training programme of newly recruited assistant professors of UAS (B)	Directorate of Extension, STU, UAS, Bangalore	15 <sup>th</sup> – 29 <sup>th</sup> May 2013
Mr. Pradeep Kumar H	Programme Assistant (Comp.)	Enhancement of programming skill development [(Structured Query Languages), Visual Studio.Net Programming (C#) with SQL (Structured Query Languages) & Use of Asynchronous JavaScript XML (AJAX)]	Directorate of Extension, UAS, Dharwad	18th -31st August 2013
Ms. Accamma K.B.	Assistant	Service matter and financial management	STU, DE, UAS, Bangalore	16 <sup>th</sup> to 21 <sup>st</sup> September 2014
Mr. Nagappa Desai	SMS (Horticulture)	Recent advances in Micro irrigation and Fertigation	Department of Agronomy, Tamilnadu Agriculture university, Coimbatore	4th -24th Sept.2013
Ms. Arjuman Banu	Training Assistant	Orientation programme for technical staff of KVK	KVK, Chintamani	26 <sup>th</sup> to 28 <sup>th</sup> Dec. 2013
Ms. Roopa B Patil	SMS (Home Sc.)	Orientation programme for technical staff of KVK	KVK, Chintamani	26 <sup>th</sup> to 28 <sup>th</sup> Dec. 2013
Dr. H.B. Shivappa Nayaka	SMS (Animal Sc.)	Orientation programme for technical staff of KVK	KVK, Chintamani	26 <sup>th</sup> to 28 <sup>th</sup> Dec. 2013
Mr. Nagappa desai	SMS (Horticulture)	Improved good Agricultural practices for different vegetables and Fruit crops with reference to climate change	Indian Institute of Horticultural Research, Hessaraghatta, Bangalore	11 <sup>th</sup> to 18 <sup>th</sup> February 2014

# 16. Please include any other important and relevant information which has not been reflected above (write in detail). Farmers Field School during 2013-14

Crop	Technology	Area (ha)	Funding Agency	Village/ Taluk
Little millet	Improved production technologies of Little millet (Saame)	1.0	KVK (ICAR)	Pattarehalli, Tiptur Tq