

ANNUAL REPORT (April-2017-March-2018)

APR SUMMARY

1. Training Programmes

Clientele	No. of Courses	Male	Female	Total participants
Farmers & farm women	28	989	347	1336
Rural youths	3	70	2	72
Extension functionaries	3	149	24	173
Sponsored Training	6	66	257	323
Vocational Training	1	2	48	50
Total	41	1276	678	1954

2. Frontline demonstrations

Enterprise	No. of Farmers	Area (ha)	Units/Animals
Oilseeds	-	-	-
Pulses	-	-	-
Cereals	10	4	-
Vegetables	20	2	-
Other crops	70	25	-
Total	100	29	
Livestock & Fisheries	-	-	-
Other enterprises	15	-	15
Total	15	-	15
Grand Total	115	29	15

3. Technology Assessment & Refinement - Nil

4. Extension Programmes

Category	No. of Programmes	Total Participants
Extension activities	400	13824
Other extension activities	218	-
Total	618	13824

5. Mobile Advisory Services

Types of Messages	Type of messages													
	Crop		Livestock		Weather		Marketing		Awareness		Other enterprise		Total	
	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers
Text only	86	78561	10	9281	44	4620	8	840	42	36860	12	1260	201	131422
Voice only	8	840	2	210	0	0	2	210	12	1260	6	630	30	3150
Voice & Text both	6	630	2	210	0	0	2	210	5	525	5	525	20	2100
Total Messages	100	-	14	-	44	-	12	-	59	-	23	-	251	-
Total farmers Benefitted	-	9331	-	9701	-	4620	-	1260	-	38645	-	2415	-	136672

6. Seed & Planting Material Production

	Quintal/Number	Value Rs.
Seed (q)	377.54	902100
Planting material (No.)	920	12385
Bio-Products (kg)	2225	115400
Livestock Production (No.)	3191	101250
Fishery production (No.)	0	0
Total	6713.54	1131135

7. Soil, water & plant Analysis

Samples	No. of Beneficiaries	Value Rs.
Soil	62	3350
Water	35	1750
Total	97	5100

8. HRD and Publications

Sr. No.	Category	Number
1	Workshops	19
2	Conferences	6
3	Meetings	14
4	Trainings for KVK officials	2
5	Visits of KVK officials	10
6	Book published	1
7	Research papers	2
8	Extension folder	8
9	Award & recognition	4

DETAIL REPORT OF APR-2017-18

1. GENERAL INFORMATION ABOUT THE KVK

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

Address	Telephone		E mail
	Office	FAX	
ICAR-Krishi Vigyan Kendra Needamangalam Thiruvarur District PIN - 614 404	04367- 260666 04367- 261444	04367- 260666	kvkndm@tnau.ac.in

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

Address	Telephone		E mail
	Office	FAX	
Tamil Nadu Agricultural University, Coimbatore PIN - 641 003	0422- 2431222	0422-2431821	registrar@tnau.ac.in

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

Name	Telephone / Contact		
	Residence	Mobile	Email
Dr. A. Baskaran	-	9566841517	vabscientist@yahoo.co.in

1.4. Year of sanction: 2004

1.5. Staff Position (as on 30th March, 2018)

S.No.	Sanctioned post	Name of the incumbent	Designation	Discipline	Pay Scale (Rs.)	Present Basic (Rs.)	Date of joining	Permanent / Temporary	Category (SC/ST/OBC/Others)
1	Programme Coordinator	Dr. A. Baskaran	Programme Coordinator	Horticulture	37400- 67000	50720	06.04.2017	Permanent	SC
2	Subject Matter Specialist	Dr. R. Ramesh	Subject Matter Specialist	Agricultural Entomology	15600 - 39100	27170	31.07.2014	Permanent	BC
3	Subject Matter Specialist	Dr. S. Saravanan	Subject Matter Specialist	Veterinary and Animal Science	15600 - 39100	25030	01.10.2014	Permanent	BC
4	Subject Matter Specialist	Dr. Dhasarathan	Training Assistant	Plant Breeding and Genetics	Consolidated pay 36000	36000	01.03.2018	Temporary	MBC
5	Subject Matter Specialist	Dr. J. Vanitha Sri	Training Assistant	Home Science	Consolidated pay 34000	34000	02.03.2018	Temporary	SC
6	Subject Matter Specialist	Vacant post	--	--	--	--	--	--	--
7	Subject Matter Specialist	Vacant post	--	--	--	--	--	--	--
8	Programme Assistant	Tmt. D. Reka	Programme Asst. (Tech.)	Home Science	35900 - 113500	54200	04.06.2007	Permanent	BC
9	Computer Programmer	Tmt. R. Sakunthala	Programme Asst. (Comp.)	Computer Application	35900 - 113500	49600	12.04.2017	Permanent	BC
10	Farm Manager	Th.D. Nakkiran	Farm Manager	Agriculture	35900 - 113500	42800	26.08.2013	Permanent	BC
11	Stenographer	Th.D. Senthilkumar	Assistant	--	20600 - 65500	38300	02.05.2013	Permanent	BC
12	Superintendent	Tmt. P. Poongodi	JA cum Typist	--	19500 - 62000	19500	23.01.2018	Permanent	MBC
13	Driver 1	Th. M. Vincent Paul	Supervisor	--	35400 - 112400	53600	04.11.2013	Permanent	BC
14	Driver 2	Th. K. Babu	Driver	--	19500 - 62000	32200	29.06.2016	Permanent	SC
15	Supporting Staff	Th. M. Kumaran	PUSM	--	15700 - 50000	16700	01.04.2009	Permanent	SC
16	Supporting Staff	Vacant post	--	--	--	--	--	--	--

1.6.Total land with KVK (in ha):

S. No.	Item	Area (ha)
1	Under Buildings and demo units	2.08
2.	Under Road	1.22
3.	Under Crops	13.90
4	Orchard/ Agro-forestry	-
4.	Others -Old threshing floor, ditch & fallow/not in use	3.82

1.7.Infrastructural Development:**A) Buildings**

S. No.	Name of building	Source of funding	Stage					
			Complete			Incomplete		
			Completion Date	Plinth area (Sq.m)	Expenditure (Rs in lakhs.)	Starting Date	Plinth area (Sq.m)	Status of construction
1.	Administrative Building	ICAR	23.2.08	548.24	42.47	-	-	-
2.	Farmers Hostel	ICAR	23.2.08	353.00	27.00	-	-	-
3.	Staff Quarters	ICAR	23.2.08	459.00	32.00	-	-	-
4.	Demonstration Units							
	1.Vermi compost	ICAR-RF	31.03.07	30	-	-	-	-
	2.Mushroom	ICAR-RF	31.03.07	20	-	-	-	-

	3. Community shade net	NADP	03.02.08	930	1.0	-	-	-
	4. Precision farming	NADP	31.03.08	10,000	2.0	-	-	-
	5. Azolla production	ICAR-RF	05.07.09	120	-	-	-	-
	6. Organic farm	GOI-NCOF	01.04.07	14,000	4.0	-	-	-
	7. Slatted house goat rearing	ICAR-RF	30.11.09	24	0.15	-	-	-
	8. Back yard poultry	ATMA	30.11.09	36	0.50	-	-	-
	9. Farm pond -composite fish culture	ICAR	18.11.10	3500	2.00	-	-	-
	10. Demo unit -bio control production unit	ICAR	20.03.11	160	4.00	-	-	-
5	Fencing	ICAR	23.2.08	1200 RM	5.00	-	-	-
6	Rain Water harvesting system	Govt. of TN	31.03.07	1320	0.36	-	-	-
7	Threshing and drying yard	ICAR	20.3.11	394	2.00	-	-	-
8	Farm godown	Govt. of TN	-	3 Nos	-	-	-	-
9	Vehicle and Implement shed	ICAR	20.03.11	37	3.00	-	-	-
10	Farm road	ICAR	29.3.11	2200	2.00	-	-	-
11.	Irrigation system	ICAR	18.11.10	282 RM	1.00	-	-	-

B) Vehicles as on 31.03.2018

Type of vehicle	Year of purchase	Cost (Rs.)	Total kms. Run	Present status
Jeep Bolero-TN 66 V 0317	2017	834445	12890	Good running condition
Jeep - Bolero-LX-2HD- TN 55 5520	2004	4,40,751	-	Condemned- Auction is under progress
Tractor with Trailer - Mahindra & Mahindra D1-475-40 HP	2004	4,37,607	2347.6	Good running condition
Two wheeler - TVS STAR CITY	2006	39,400	46258	Good running condition
Two wheeler - Honda Activa	2009	50,000	59693	Good running condition
Power tiller - VST Sakti	2011	1,35,870	605.5	Good running condition

C) Equipments & AV aids

Name of the equipment	Year of purchase	Cost (Rs.)	Present status
Desktop Computer Acer- 2 Nos	31.03.2016	82,500	Good
Desktop Computer-HCL	25.03.2011	27403	Good
Desktop Computer- HP	31.03.2015	39480	Good
Apple IMAC Workstation	02.11.09	56000	Minor Repair
Laptop Dell vostro	31.03.2011	48025	Good
Laptop Dell inspiron	24.03.2010	40040	Good
Laptop Sony	05.12.2011	34990	Good
Ricoh Photo copier	31.03.2016	76,800	Good
Printer-HP Laser jet 1566	25.03.2011	8750	Good
Samsung Laser Printer	31.03.2016	9700	Good
Printer-HP 1010	31.03.05	8800	Good
Samsung 4521 F Laser jet model Fax and printer	February, 2009	14,400	Good
Epson Scanner	31.03.2016	5638	Good
Video camera - Sony with accessories	March , 2011	25,000	Good
LCD projector with accessories	March , 2011	97,000	Good
Generator	March , 2011	1,35,980	Good

Public Address System	March , 2011	20,820	Good
Land leveler	Jan' 2011	10,000	Good
Furniture and furnishing	March , 2011	2,00,000	Good
Digital Visible Spectro photo meter	2011	37600	Not working
Digital pH meter	2011	5740	Good
All Glass Single Distillation unit	2011	35000	Not working
Khan Shaker	2011	20000	Good
Hot air oven	2011	17000	Good
Hot plate	2011	7650	Good
Willey mill	2011	31500	Good
Water Bath	2011	6970	Good
UP based Flame Photometer	2011	43500	Not working
Digital conductivity meter	2011	10890	Not working
Electronic Top loading balance	2011	6500	Good
Electronic Top loading balance	2011	19800	Good
Digestion system (Kelplus)	2011	107900	Not working
Distillation system (Kelplus)	2011	175900	Not working
Instrument table	2011	78000	Good
Wash basin, sink and exhaust fan	2011	-	Good
Titration unit	2011	2762	Not working
Vacuum pump	2011	14025	
1 ton AC	2011	19550	Not working
Fire extinguisher	2011	3720	Not working
Exhaust fan	2011	12240	Good
Shaker	2011	20000	Good
Water Bath	2011	6970	Good
Induction hot plate	2011	7650	Good
Printer -HP-Lazer jet printer P 1566	2011	8750	Good
Sand Path	2011	1350	Good
LG Refreigrator	2011	9890	Good
Sink Unit	2011	36770	Good
LPG Set up	2011	8075	Good
Wall Storage Cuboard	2011	15936	Good

Wall side storage Cabinet	2011	15936	Good
Storage Cabinet	2011	44837	Good
Laboratory revolving stool	2011	11730	Good
Steel rack	2011	13005	Good
Stotted Angle iron rack	2011	8670	Good
Steel Almirah	2011	44488	Good
Work Table	2011	15725	Good
Executive chair netted	2011	4930	Good
Laboratory revolving Chair	2011	5440	Good
Portable soil and water and kit	2011	27200	Good
GPS	2011	17000	Good
Vaccuum pump	2011	7200	Good
Bucket flask lit with Buchner finnel	2011	637	Not working
Computer table	2011	3570	Good

1.8. A). Details SAC meeting* conducted in the year

Date : 22.09.2016

No of Participants : 23

Sl.No.	Salient Recommendations
1.	Trainings on timber tree cultivation techniques should be given in coordination with Department of Forestry.
2.	Explore the methods to improve the paddy straw quality in machine harvested paddy fields.
3	Rearing of sheep's in ICAR-KVK farm may be initiated before popularizing in Thiruvarur District.
4	Model mulberry garden may be developed at ICAR-KVK, Needamangalam.
5	Invite NABARD and Lead Bank officials for giving details about their schemes on agriculture and allied sectors during the training programme.
6	Dwarf karpooravalli banana variety may be demonstrated in Thiruvarur District with an input from National Research Centre for Banana (NRCB), Trichy.
7	New technologies, varieties may be popularized by conducting campaigns, field days and giving wider publicity through print and electronic media.
8	Demonstration of fodder cultivation in Thiruvarur district may be conducted jointly with Department of Animal husbandry.
9	Production of fodder seeds and cuttings may be initiated in ICAR-KVK farm for supplying to the farmers of Thiruvarur district.

10	Utilizing the services of scientists from nearby research stations for conducting trainings, demonstrations, on farm testing and field days.
11	Rearing of Poultry desi birds like Vanaraj and Gramapriya may be demonstrated in Thiruvarur District.
12	Model fish pond may be developed at ICAR-KV farm by getting fund from National Fisheries Development Board, Hyderabad.
13	New strategies for water saving methods in paddy cultivation may be explored and demonstrated to the farmers of Thiruvarur District.
14	Trainings and demonstration of Roof top garden may be given to urban people of Thiruvarur District.
15	Nutritional chart for important crops may be displayed at ICAR-KVK, Needamangalam
16	Demonstration of releasing parasitoids for the management of cotton mealy bug.
17	Trainings on micro irrigations like sprinklers, rain guns may be given and demonstrated in vegetable crops.
18	Trainings on value addition in paddy and pulses may be given to the farmers of Thiruvarur district

** Attach a copy of SAC proceedings along with list of participants*

Attached In Annexure-I

2. DETAILS OF DISTRICT (2017-18)

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

S. No	Farming system/ enterprise
1	Rice based cropping system

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

S. No	Agro-climatic Zone	Characteristics
1	Cauvery Delta Zone	Alluvial terrain with gentle slope
	Agro ecological situation	Characteristics
2	Wet land eco system	Low land delta plain

2.3 Soil type/s

S. No	Soil type	Characteristics	Area in ha
1	Clay to clay loam- Old Delta	Low land	1,27,506
2	Sandy to sandy clay loam- New Delta	Light textured soil	27,048

2.4. Area, Production and Productivity of major crops cultivated in the district (2017-18)

S. No	Crop	Area (ha)	Production (Qtl)	Productivity (Qtl /ha)
1	Paddy	181046	103.976	63.12
2	Blackgram	55221	0.53453928	9.68
3	Greengram	45436	1.1904232	2.62
4	Redgram	20		
5	Cotton	4197		
6	Sugarcane	168		
7	Seasame	555		
8	Groundnut	2974		
9	Oilpalm	208		
10	Maize	32		
11	Coconut	4030		
12	Others	3		

2.5. Weather data (2017-18)

Month	Rainfall (mm)	Temperature ° C		Relative Humidity (%)
		Maximum	Minimum	
April 2017	0	34	29	84
May 2017	19.28	35	30	82
June 2017	60.96	34	25	84
July 2017	59.97	36	27	81
August 2017	149.56	35	26	82
September 2017	119.99	35	26.5	81
October 2017	128.78	34	25	80
November 2017	363.96	31	25	80
December 2017	209.29	34	26	82
January 2018	31.02	33	26.5	84
February 2018	0	33	25	79
March 2018	7.64	36	26	80
Total/ Average	1150.45	34.16	26.4	81.58

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

Category	Population	Production	Productivity
Cattle			
<i>Crossbred</i>	147432		8.5 litres/ Animal
<i>Indigenous</i>	195743		7 Litres / Animal
Buffalo	2070		4.5 Litres/ Animal
Sheep			
Crossbred	818		12 kg
<i>Indigenous</i>	3773		8.5 kg
Goats	286879 Nos.		15 kg / Animal
Pigs			
<i>Crossbred</i>	97		-
<i>Indigenous</i>	996		-
Rabbits	508		-
Poultry			
Hens	45131	322 Lakhs	1.25 kg / bird
Desi	39176		
Improved	5955		
Ducks	1140		
Turkey and others	4658		

Category	Area	Production	Productivity
Fish			
Marine	47 km	623t	-
Inland	350 ha	8900 t	-

Source : Animal husbandry - Livestock census-2012

2.7. Details of Adopted Villages (2017-18)

Year of adoption: 2017-18

Sl.No.	Taluk/ mandal	Name of the block	Name of the village	Major crops & enterprises	Major problem identified	Identified Thrust Areas
1	Mannargudi	Mannargudi	Melanagai	Snake gourd	Low income under local varieties and susceptible to pest and diseases	FLD- Demonstration of Integrated Crop Management (ICM) in Snake Gourd Hybrid CoH 1
2	Mannargudi	Mannargudi	Melanagai	Bottle gourd	Lack of awareness on dual purpose Bottle gourd	FLD-Demonstration of Integrated Crop Management (ICM) in dual purpose Bottle gourd PLR 1
3	Needamangalam	Needamangalam	Keezhapattu, Melalavanthaseri	Moringa	<ul style="list-style-type: none"> ➤ Widespread prevalence of anaemia among women. ➤ Lack of knowledge on preparation of iron rich convenience foods 	FLD-Demonstration of production of dehydrated moringa and their products as entrepreneurial activity
4	Needamangalam	Needamangalam	Adhanur	Value Addition	<ul style="list-style-type: none"> ➤ Low shelf life of paneer ➤ Bland flavour of paneer 	FLD -Demonstration of extension of shelflife of paneer using herbs and spice

5	Needamangalam	Needamangalam	Devangudi	Paddy	Severe infestation of Pest (Leaffolder) and Disease (Blast) during kharif and rabi seasons..	FLD Demonstration of Bio-intensive Module for the Management of Pests and Diseases in Paddy
6	Mannargudi	Mannargudi	Koopachikottai, Kandithampettai	Coconut	Farmers are regularly contacting for the management of rhinoceros beetle	FLD -Demonstration of Management of coconut rhinoceros beetle
7	Mannargudi Needamangalam	Mannargudi Needamangalam	Mannargudi, Kezhuvathur, Periyakottai	Fodder	Unavailability of Drought resistant green fodder	Demonstration on CoFS 31 fodder crop
8	Valaingaiman	Valaingaiman	Alangudi	Cotton	Improper application of fertilizer weed infestation problem Flower shuttering	Demonstration of ICM practices for summer irrigated cotton

2.8. Priority/thrust areas

Crop/Enterprise	Thrust area
Snake gourd	Hybrid Introduction
Bottle gourd	Variety introduction
Moringa	Value addition
Paneer	Value addition
Paddy	Integrated Pest and Disease Management
Coconut	Integrated Pest Management
Fodder	Fodder production
Cotton	Integrated Crop Management

3. TECHNICAL ACHIEVEMENTS

3.A. Details of target and achievements of mandatory activities by KVK during 2017-18

OFT (Technology Assessment)				FLD (crop/enterprise/CFLDs)			
1				2			
Number of technologies		Total no. of Trials		Area in ha		Number of Farmers	
Targets	Achievement	Targets	Achievement	Targets	Achievement	Targets	Achievement
4	0	40	0	40	29	155	115

Training (including sponsored, vocational and other trainings carried under Rainwater Harvesting Unit)					Extension Activities			
3					4			
Number of Courses			Number of Participants		Number of activities		Number of participants	
Clientele	Targets	Achievement	Targets	Achievement	Targets	Achievement	Targets	Achievement
Farmers	35	28	1500	1336	600	618	13000	13824
Rural youth	5	3	125	72				
Extn.Functionaries	5	3	150	173				

Seed Production (Qtl.)			Planting material (Nos.)		
5			6		
Target	Achievement	Distributed to no. of farmers	Target	Achievement	Distributed to no. of farmers
500	377.54	196	1000	920	10

3.b. TECHNOLOGY ASSESSMENT :Nil

3.c. TECHNOLOGY ASSESSMENT IN DETAIL : Nil

3.d. FRONTLINE DEMONSTRATION

a. Follow-up of FLDs implemented during previous years

S. No	Crop/Enterprise	Thematic Area*	Technology demonstrated	Details of popularization methods suggested to the Extension system	Horizontal spread of technology		
	Paddy	Pest management	Demonstration of Ecological Engineering concept of pest management in paddy	<ul style="list-style-type: none"> ➤ Bund crops with Pulses ➤ Soil application of <i>Pseudomonas fluorescens</i> @ 1kg/ac at 30 DAT. ➤ Release of <i>Trichogramma japonicum</i> 2 cc at 30, and 37 DAT. ➤ Release of <i>Trichogramma chilonis</i> 2 cc at 37, 45 and 51 DAT. ➤ Installation Sex pheromone trap @ 5/acre. ➤ Installation of Yellow sticky trap @ 12/ac ➤ 3 % Neem oil or Azadirachtin spray 	8	65	150

b. Details of FLDs implemented during the current year

Sl. No.	Crop	Thematic area	Technology Demonstrated	Season and year	Source of funds	Area (ha)		No. of farmers/ demonstration			Reasons for shortfall in achievement
						Proposed	Actual	SC/ST	Others	Total	
1	Snake Gourd	Integrated Crop Management	Demonstration of Integrated Crop Management (ICM) in Snake Gourd Hybrid CoH 1	Rabi 2017	ICAR	1	1	2	8	10	-

2	Bottle gourd	Integrated Crop Management	Demonstration of Integrated Crop Management (ICM) in dual purpose Bottle gourd PLR 1	Rabi 2017	ICAR	1	1	2	8	10	-
3	Coconut	Integrated Pest Management	Demonstration of Management of coconut rhinoceros beetle	Rabi 2017	ICAR	20	20	3	32	35	-
4	Rice	Integrated Pest Management	Demonstration of Bio-intensive Module for the Management of Pests and Diseases in Paddy	Rabi 2017	ICAR	4	4	1	9	10	-
5	Cotton	Integrated Crop Management	Demonstration of ICM practices for summer irrigated cotton	Summer 2018	ICAR	4	4	-	10	10	-
8	Fodder Sorghum	Varietal introduction	Demonstration on CoFS 31 fodder crop	Summer 2018	ICAR	1	1	2	8	10	-
9	Dehydrated moringa	Value Addition	Demonstration of production of dehydrated moringa and their products as entrepreneurial activity	All round the year	ICAR	-	-	-	-	5	-
10	Paneer	Value Addition	Demonstration of extension of shelf life of paneer using herbs and spice	All round the year	ICAR	-	-	-	-	10	-

Details of farming situation

Crop	Season	Farming situation (RF/Irrigated)	Soil type	Status of soil			Previous crop	Sowing date	Harvest date	Seasonal rainfall (mm)	No. of rainy days
				N	P	K					
Snake Gourd	Rabi 2017	Irrigated	Sandy loam	L	M	H	Vegetables	12.08.2017	27.12.2017	1150.45 mm (Annual RF)	
Bottle gourd	Rabi 2017	Irrigated	Sandy loam	L	M	H	Vegetables	10.08.2017	20.11.2017		
Coconut	Rabi 2017	Irrigated	Sandy loam	L	M	H	-	-	-		-
Paddy	Rabi 2017	Irrigated	Sandy clay loam	L	M	H	Paddy	05.09.2017	10.01.2018		
Cotton	Summer 2018	Irrigated	Sandy clay loam	L	M	H	Paddy	10.03.2017	16.07.2017		
Fodder Sorghum	Summer 2018	Irrigated	Clay	L	M	H	-	-	-	-	-

Technical Feedback on the demonstrated technologies (2016-17)

S. No	Title	Feed Back
1	Demonstration on Eco friendly Management Sucking Pests in Cotton with Special Reference to Mealy Bug	During summer, mealy bug is a major threat in cotton and mostly inorganic pesticides are used to manage this pest. But most of the time it could not give effective control due to waxy coating

Farmers' reactions on specific technologies (2016-17)

S. No	Title	Feed Back
1	Demonstration on Eco friendly Management Sucking Pests in Cotton with Special Reference to Mealy Bug	Eco friendly management with Azadirachtin, FORS and V. leani provided effective control of mealy bug in cotton

Technical Feedback on the demonstrated technologies (2017-18)

S. No	Title	Feed Back
1	Demonstration of Integrated Crop Management (ICM) in Snake Gourd Hybrid CoH 1	Yield increases upto 38% when adopting the ICM practices
2	Demonstration of Integrated Crop Management (ICM) in dual purpose Bottle gourd PLR 1	Yield increases upto 19 % when adopting the ICM practices
3	Demonstration of Bio-intensive Module for the Management of Pests and Diseases in Paddy	Pest and disease management using biological organism is really produced good control of insect and pests over inorganic chemical compounds without affecting the environment
4	Demonstration of production of dehydrated moringa and their products as entrepreneurial activity	Farmers were trained different methods of drying and they developed various value added products from moringa leaves
5	Demonstration of extension of shelf life of paneer using herbs and spice	Paneer shelf life is very low so they aware about new technologies about increasing shelf life of paneer products. Turmeric contains antioxidant property, cumin had easily digestive property and mint had a very good aroma and flavor.

Farmers' reactions on specific technologies (2017-18)

S. No	Title	Feed Back
1	Demonstration of Integrated Crop Management (ICM) in Snake Gourd Hybrid CoH 1	Farmer satisfied with performance of Snake Gourd Hybrid CoH 1 due to high yield and economics.
2	Demonstration of Integrated Crop Management (ICM) in dual purpose Bottle gourd PLR 1	Farmer satisfied with performance of Bottle gourd PLR 1 due to high market price.

3	Demonstration of Bio-intensive Module for the Management of Pests and Diseases in Paddy	The availability of egg parasitoids viz., Trichogramma chilonis and T.japonicum in appropriate time is question as t ca not be stored for many days. If make sure the vailabiility of those parasitoids, its easy and effective method to control insect pests of paddy.
4	Demonstration of production of dehydrated moringa and their products as entrepreneurial activity	Farmers want Drier facilities for moringa at village level
5	Demonstration of extension of shelf life of paneer using herbs and spice	Farmers demand for marketing of panner

Extension and Training activities under FLD

Sl.No.	Activity	No. of activities organized	Date	Number of participants	Remarks
1	Field days	1	10.01.2018	25	
2	Farmers Training	20	10.11.2017 29.12.2017 07.03.2018	85	Time taken is more for drying
3	Media coverage	12	-	Mass	FLD on cotton, coconut and Rice
4	Training for extension functionaries	3	12.12.2017 12.09.2017 10.10.2017	48	FLD on cotton, coconut and Rice

Performance of Frontline demonstrations

Frontline demonstrations on crops (2016-17)

Crop	Thematic Area	Technology demonstrated	Name of the Variety/ Hybrid		No. of Farmers	Area (ha)	Yield (q/ha)				% Increase in yield	Economics of demonstration (Rs./ha)				Economics of check (Rs./ha)			
							Demo			Check		Gross Cost	Gross Return	Net Return	BCR (R/C)	Gross Cost	Gross Return	Net Return	BCR (R/C)
							High	Low	Average										
Commercial crops																			
Cotton	Management of Cotton mealy bug	Demonstration on Eco friendly Management Sucking Pests in Cotton with Special Reference to Mealy Bug	RCH 659	Yuva	10	4	42.5	35.0	39.25	34.75	12.95	81900	227650	145750	2.78	78650	201550	122900	2.56

Frontline demonstrations on crops (2017-18)

Crop	Thematic Area	Technology demonstrated	Name of the Variety/ Hybrid		No. of Farmers	Area (ha)	Yield (q/ha)				% Increase in yield	Economics of demonstration (Rs./ha)				Economics of check (Rs./ha)			
							Demo			Check		Gross Cost	Gross Return	Net Return	BCR (R/C)	Gross Cost	Gross Return	Net Return	BCR (R/C)
							High	Low	Average										
Cereals																			
Paddy	Pest and disease management	Demonstration of Bio-intensive Module for the Management of Pests and Diseases in Paddy	CR1009	ADT 50	10	4	74.25	56.25	62.55	53.10	17.80	37040	103208	66168	2.79	36463	87615	51153	2.40

Crop	Thematic Area	Technology demonstrated	Name of the Variety/ Hybrid		No. of Farmers	Area (ha)	Yield (q/ha)				% Increase in yield	Economics of demonstration (Rs./ha)				Economics of check (Rs./ha)			
			Domo	Check			Demo			Check		Gross Cost	Gross Return	Net Return	BCR (R/C)	Gross Cost	Gross Return	Net Return	BCR (R/C)
							High	Low	Average										
Commercial crops																			
Vegetables	Integrated Crop Management	Demonstration of Integrated Crop Management (ICM) in dual purpose Bottle gourd PLR 1	PLR 1	local	10	1.0	319.20	280.70	315.30	264.00	19	42000	126120	84120	3.00	32000	88000	56000	2.75
Cotton	ICM practices in cotton	Demonstration of ICM practices for summer irrigated cotton	RCH 659		10	4	Ongoing												
Plantation crops																			
Coconut	Coconut rhinoceros beetle management	Demonstration of Management of coconut rhinoceros beetle	TxD	TxD	35	50	Ongoing												

FLD on Women Empowerment :

Category	Name of technology	No. of demonstrations	Name of observations	Demonstration	Check												
Milk	Demonstration of extension of shelf life of paneer using herbs and spice	5	Recovery percentage, organoleptic evaluation and shelf life study	<ul style="list-style-type: none"> Different flavored of paneer like mint (herbs) cumin (spice) and turmeric (spice) were demonstrated. The recovery of paneer prepared from one litre milk was 180g. Based on organoleptic score, the different flavor paneer product was highly accepted by the farmers with 9 point hedonic scale. Shelf life of the different flavored paneer noted only one day in room temperature and 10 days under refrigerated condition as that of plain paneer. <table border="1" data-bbox="945 678 1854 916"> <thead> <tr> <th>Details</th> <th>Cost (Rs/100 g)</th> </tr> </thead> <tbody> <tr> <td>Milk</td> <td>40 / litre</td> </tr> <tr> <td>Plain paneer</td> <td>62</td> </tr> <tr> <td>Mint paneer</td> <td>70</td> </tr> <tr> <td>Cumin paneer</td> <td>72</td> </tr> <tr> <td>Turmeric paneer</td> <td>70</td> </tr> </tbody> </table> <p>The selling price of milk was Rs.40/ litre in Thiruvarur district and but the selling price of the flavoured paneer was double the amount of milk. So the farmers were benefitted by selling the flavoured paneer than milk.</p>	Details	Cost (Rs/100 g)	Milk	40 / litre	Plain paneer	62	Mint paneer	70	Cumin paneer	72	Turmeric paneer	70	Farmers are using as such milk and they have sold milk.
Details	Cost (Rs/100 g)																
Milk	40 / litre																
Plain paneer	62																
Mint paneer	70																
Cumin paneer	72																
Turmeric paneer	70																

Category	Name of technology	No. of demonstrations	Name of observations	Demonstration	Check														
Moringa leaves	Demonstration of production of dehydrated moringa and their products as entrepreneurial activity	5	Time for dehydration, recovery percentage, organoleptic properties and BCR	<ul style="list-style-type: none"> The dehydration time was 45-60 hours in 55- 60° C. Recovery percentage of 140g dried leaves was obtained from 1000 g of fresh leaves and the 145g dehydrated moringa powder was obtained. Organoleptic score 4 - 5 per cent for dried moringa leaf powder was noted. It was accepted by the farmer's .Because the more than five per cent incorporation gives bitter taste of the products. <table border="1"> <thead> <tr> <th>List of the moringa products</th> <th>Cost (Rs/Kg)</th> </tr> </thead> <tbody> <tr> <td>Fresh moringa leaves (250g/ bundle Rs 10/-)</td> <td>40</td> </tr> <tr> <td>Dried moringa leaves</td> <td>580</td> </tr> <tr> <td>Dried moringa leaf powder</td> <td>760</td> </tr> <tr> <td>Moringa tea powder</td> <td>310</td> </tr> <tr> <td>Moringa noodles</td> <td>110</td> </tr> <tr> <td>Moringa soup mix</td> <td>175</td> </tr> </tbody> </table>	List of the moringa products	Cost (Rs/Kg)	Fresh moringa leaves (250g/ bundle Rs 10/-)	40	Dried moringa leaves	580	Dried moringa leaf powder	760	Moringa tea powder	310	Moringa noodles	110	Moringa soup mix	175	Using moringa leaves
List of the moringa products	Cost (Rs/Kg)																		
Fresh moringa leaves (250g/ bundle Rs 10/-)	40																		
Dried moringa leaves	580																		
Dried moringa leaf powder	760																		
Moringa tea powder	310																		
Moringa noodles	110																		
Moringa soup mix	175																		

FLD on Demonstration details on crop hybrids

Crop	technology demonstrated	Hybrid Variety	No. of Farmers	Area (ha)	Yield (q/ha)				% Increase in yield	Economics of demonstration (Rs./ha)			
					Demo			Check		Gross Cost	Gross Return	Net Return	BCR (R/C)
					High	Low	Average						
Vegetable crop	Demonstration of Integrated Crop Management (ICM) in Snake Gourd Hybrid CoH 1	CoH 1	10	1	260.14	243.40	251.57	181.20	38	42000	125783	83783	2.99

4.Training Programmes

Farmers' Training including sponsored training programmes (on campus)

Thematic area	No. of courses	Participants								
		Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Crop Production										
Cropping Systems	1	25	-	25	-	-	-	25	-	25
Crop Diversification	1	10	8	18	-	-	-	10	8	18
Integrated Farming										
Seed production	1	19	9	28	10	2	12	29	11	40
Integrated Crop Management	1	67	11	78	-	-	-	67	11	78
Soil & water conservatioin	1	100	30	130	15	7	22	115	37	152
Others - ICT tools	1	23	4	27	9	-	9	32	4	36
Total	6	244	62	306	34	9	43	178	71	349
Soil Health and Fertility Management										
Integrated water management	1	33	-	33	16	1	17	49	1	50
Total	1	33	-	33	16	1	17	49	1	50
Feed & fodder technology	1	-	58	58	-	7	7	-	65	65
Total	1	-	58	58	-	7	7	-	65	65
Home Science/Women empowerment										
Gender mainstreaming through SHGs	1	-	8	8	-	-	-	-	8	8
Value addition	1	10	38	48	-	7	7	10	45	55
Women empowerment	1	6	30	36	-	6	6	6	36	42
Total	3	16	76	92	-	13	13	16	89	105

Thematic area	No. of courses	Participants								
		Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Plant Protection										
Integrated Pest Management	1	14	13	27	2	1	3	16	14	30
Integrated Disease Management	1	12	8	20	2	-	2	14	8	22
Total	2	26	21	47	4	1	5	30	22	52
Production of Inputs at site										
Mushroom Production	1	44	3	47	5	-	5	49	3	52
Apiculture	1	96	10	106	16	-	16	112	1	122
Total	2	140	13	153	21	-	21	161	4	174
GRAND TOTAL	15	459	230	689	75	31	106	534	261	795

Farmers' Training including sponsored training programmes (off campus)

Thematic area	No. of courses	Participants								
		Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Crop Production										
Cropping Systems	3	144	-	144	22	-	22	166	-	166
Crop Diversification	1	46	24	70	-	-	-	46	24	70
Micro Irrigation/irrigation	1	40	4	44	14	1	15	54	5	59
Seed production	1	39	-	39	11	-	11	50	-	50
Integrated Crop Management	1	28	-	28	-	-	-	28	-	28
Total	7	297	28	325	47	1	48	344	29	373
Horticulture										
a) Vegetable Crops										
Protective cultivation	1	24	1	25	-	-	-	24	1	25
Total (a)	1	24	1	25	-	-	-	24	1	25

Thematic area	No. of courses	Participants								
		Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Home Science/Women empowerment										
Household food security by kitchen gardening and nutrition gardening	1	5	17	22	9	10	19	14	27	41
Value addition	1	-	23	23	-	-	-	-	23	23
Total	2	5	40	45	9	10	19	14	50	64
Plant Protection										
Integrated Pest Management	1	20	1	21	5	1	6	25	2	27
Integrated Disease Management	1	23	-	23	-	-	-	23	-	23
Bio-control of pests and diseases	1	21	-	21	-	4	4	21	4	25
Total	3	64	1	65	5	5	10	69	6	75
GRAND TOTAL	13	325	70	395	126	16	142	451	86	537

Farmers' Training including sponsored training programmes - CONSOLIDATED (On + Off campus)

Thematic area	No. of courses	Participants								
		Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Crop Production										
Cropping Systems	4	169	-	169	22	-	22	191	-	191
Crop Diversification	2	56	32	88	-	-	-	56	32	88
Micro Irrigation/irrigation	1	40	4	44	14	1	15	54	5	59
Seed production	2	58	9	67	21	2	23	79	11	90
Integrated Crop Management	2	95	11	106	-	-	-	95	11	106
Soil & water conservatioin	1	100	30	130	15	7	22	115	37	152
Others-ICT tools	1	23	4	27	9	-	9	32	4	36
Total	13	541	90	631	81	10	91	622	100	722
Horticulture										
a) Vegetable Crops										

Thematic area	No. of courses	Participants								
		Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Protective cultivation	1	24	1	25	-	-	-	24	1	25
Total (a)	1	24	1	25	-	-	-	24	1	25
Soil Health and Fertility Management										
Integrated water management	1	33	-	33	16	1	17	49	1	50
Total	1	33	-	33	16	1	17	49	1	50
Livestock Production and Management										
Feed & fodder technology	1	-	58	58	-	7	7	-	65	65
Total	1	-	58	58	-	7	7	-	65	65
Home Science/Women empowerment										
Household food security by kitchen gardening and nutrition gardening	1	5	17	22	9	10	19	14	27	41
Gender mainstreaming through SHGs	1	-	8	8	-	-	-	-	8	8
Value addition	2	10	61	71	-	7	7	10	68	78
Women empowerment	1	6	30	36	-	6	6	6	36	42
Total	5	21	116	137	9	23	32	30	139	169
Plant Protection										
Integrated Pest Management	2	34	14	48	7	2	9	41	16	57
Integrated Disease Management	2	35	8	43	2	-	2	37	8	45
Bio-control of pests and diseases	1	21	-	21	-	4	4	21	4	25
Total	5	60	22	112	9	6	15	99	28	127
Mushroom Production	1	44	3	47	5	-	5	49	3	52
Apiculture	1	96	10	106	16	-	16	112	1	122
Total	2	140	13	351	21	-	21	161	4	174
GRAND TOTAL	28	784	300	1084	201	47	248	985	347	1332

Training for Rural Youths including sponsored training programmes (On campus)

Area of training	No. of Courses	No. of Participants								
		General			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Protected cultivation of vegetable crops	1	4	14	18	2	-	2	18	2	20
Seed production	1	28		28	-	-	-	-28		28
Value addition	1	24-	-	24	-	-	-	24	-	24
TOTAL	3	56	14	70	2	-	2	70	2	72

Training for Rural Youth including sponsored training programmes (Off campus) : Nil

Training for Rural Youths including sponsored training programmes - CONSOLIDATED (On + Off campus)

Area of training	No. of Courses	No. of Participants								
		General			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Protected cultivation of vegetable crops	1	4	14	18	2	-	2	18	2	20
Seed production	1	28	-	28	-	-	-	-28	-	28
Value addition	1	24-	-	24	-	-	-	24	-	24
TOTAL	3	56	14	70	2	-	2	70	2	72

Training programmes for Extension Personnel including sponsored training programmes (On campus)

Area of training	No. of Courses	No. of Participants								
		General			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Productivity enhancement in field crops	1	40	3	43	-	-	-	40	3	43
Information networking among farmers	1	86	13	99	-	-	-	86	13	99
Any other (pl.specify)	1	23	8	31	-	-	-	23	8	31
TOTAL	3	149	24	173	-	-	-	149	24	173

Training programmes for Extension Personnel including sponsored training programmes (off campus) :Nil

Training programmes for Extension Personnel including sponsored training programmes - CONSOLIDATED (On + Off campus)

Area of training	No. of Courses	No. of Participants								
		General			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Productivity enhancement in field crops	1	40	3	43	-	-	-	40	3	43
Information networking among farmers	1	86	13	99	-	-	-	86	13	99
Any other (pl.specify)	1	23	8	31	-	-	-	23	8	31
TOTAL	3	149	24	173	-	-	-	149	24	173

Table. Sponsored training programmes

Area of training	No. of Courses	No. of Participants								
		General			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Crop production and management										
Increasing production and productivity of crops	1	36	-	36	-	-	-	36	-	36
Production and value addition										
Methods of protective cultivation	2	-	-	-	-	133	133	-	133	133

Total	3	36	-	36	-	133	133	36	133	169
Others - IFS	1	-	-	-	-	62	62	-	62	62
Total	1	-	-	-	-	62	62	-	62	62
Home Science										
Household nutritional security	1	-	62	62	-	-	-	-	62	62
Total	1	-	62	62	-	-	-	-	62	62
Agricultural Extension										
Capacity Building and Group Dynamics	1	30	-	30	-	-	-	30	-	30
Total	1	30	-	30	-	-	-	30	-	30
GRAND TOTAL	6	66	62	128	-	185	185	66	257	323

Name of sponsoring agencies involved

- 1.Mahalir Thittam,Thiruvarur
- 2.ATMA
- 3.Department of Horticulture

Details of vocational training programmes carried out by KVKs for rural youth

Area of training	No. of Courses	No. of Participants								
		General			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Post harvest technology and value addition										
Value addition	1	2	48	50	-	-	-	2	48	50
Total	1	2	48	50	-	-	-	2	48	50
Grand Total	1	2	48	50	-	-	-	2	48	50

5. Extension Programmes

Activities	No. of programmes	No. of farmers	No. of Extension Personnel	TOTAL
Advisory Services	12	1161	30	1191
Diagnostic visits	126	369	56	425
Field Day	3	150	6	156
Group discussions	6	186	12	198
Film Show	41	1950	16	1966
Self -help groups	2	48	-	48
Kisan Mela	1	349	10	359
Exhibition	9	5718	585	6303
Scientists' visit to farmers field	143	369	39	408
Method Demonstrations	48	2084	49	2133
Celebration of important days	5	250	5	255
Special day celebration	1	152	7	159
Exposure visits	3	220	3	223
Total	400	13006	818	13824

Details of other extension programmes

Particulars	Number
Electronic Media (CD./DVD)	4
Extension Literature	8
News paper coverage	140
Popular articles	36
Radio Talks	23
TV Talks	4
Others (pl. specify)	7
Total	222

Messages sent- MOBILE ADVISORY SERVICES THROUGH MKISAN PORTAL

No of registered farmers:4560

Types of Messages	Type of messages													
	Crop		Livestock		Weather		Marketing		Awareness		Other enterprise		Total	
	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers
Text only	33	73101	4	8651	-	-	-	-	16	34130	-	-	53	115882
Total Messages	33	-	4	-	-	-	-	-	16	-	-	-	53	-
Total farmers Benefitted	-	73101	-	8651	-	-	-	-	-	34130	-	-	-	115882

MOBILE ADVISORY SERVICES THROUGH OTHERS

No of registered farmers:105

Types of Messages	Type of messages													
	Crop		Livestock		Weather		Marketing		Awareness		Other enterprise		Total	
	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers	No of messages	No of farmers
Text only	52	5460	6	630	44	4620	8	840	26	2730	12	1260	148	15540
Voice only	8	840	2	210	0	0	2	210	12	1260	6	630	30	3150
Voice & Text both	6	630	2	210	0	0	2	210	5	525	5	525	20	2100
Total Messages	66	-	10	-	44	-	12	-	43	-	23	-	198	-
Total farmers Benefitted	-	6930	-	1050	-	4620	-	1260	-	4515	-	2415	-	20790

6. DETAILS OF TECHNOLOGY WEEK CELEBRATIONS :Nil

7. PRODUCTION OF SEED/PLANTING MATERIAL AND BIO-PRODUCTS

Production of seeds by the KVKs (give quantity of seed in quintals only)

Crop	Name of the crop	Name of the variety /hybrid	Quantity of seed produced (q)	Value (Rs)	Seed supplied to farmers		Supplied to other agencies (q)
					Quantity (q)	No of farmers	
Cereals	Rice	CO @ 51	22.76	59176	22.76	12	-
	Rice	ADT 43	6.48	16848	6.48	6	-
	Rice	CR 1009	46.26	111024	46.26	36	-
	Rice	CR 1009 sub 1	75.10	180240	75.10	42	-
	Rice	TPS 5	10.30	24720	10.30	6	-
	Rice	ADT 50	16.40	42640	16.40	13	-
	Rice	Swarna Sub 1	13.80	33120	13.80	12	-
	Rice	TRY 3	29.05	69720	29.05	14	-
	Rice	ADT 45	82.40	138432	82.40	36	-
Pulses	Black gram	ADT 5	17.99	215880	17.99	12	-
Fiber crops	Kapak		20.0	4000	20.0		
Others	Paddy straw		26.00	5200	26.00	3	-
	Drum seeder hiring		11	1100	11	4	-
Total			377.54	902100	377.54	196	-

Production of planting materials by the KVKs

Crop	Name of the crop	Name of the variety / hybrid	Number	Value (Rs.)	Planting material supplied to farmers		Supplied to other agencies (No)
					No	No of farmers	
Plantation	Coconut seedling	ECT	75	5625	75	4	-
	Coconut	2nd	845	6760	845	6	-
Total			920	12385	920	10	--

Production of Bio-Products

Bio Products	Name of the bio-product	Quantity Kg	Value (Rs.)	Supplied to farmers		Supplied to other agencies kg
				kg	No of farmers	
Bio-fungicide	Pseudomonas	1035	103500	1035	123	-
Bio Agents	Vermicompost	1190	11900	1190	14	-
Total		2225	115400	2225	137	

Production of livestock materials

Particulars of Live stock	Name of the breed	Number/ (kg)	Value (Rs.)	Supplied to farmers		Supplied to other agencies (No)
				No	No of farmers	
Dairy animals						
Others- (Pl. specify)	Goat (kg)	3135	94050	20	15	-
	Culled goat	52	5200	1	52	-
Poultry						
Others - Goose	Goose	4	2000	2	2	-
Total		3191	101250	3	69	-

8. DETAILS OF SOIL, WATER AND PLANT ANALYSIS

Samples	No. of Samples	No. of Farmers	No. of Villages	Amount realized (Rs.)
Soil	75	62	37	3350
Water	48	35	24	1750
Total	123	97	61	5100

9. SCIENTIFIC ADVISORY COMMITTEE

Date of SAC meeting	Number of members attended
22.09.2016	23

Note: please attach the proceedings of sac meeting along with the list of participants- Attached in Annexure I

10.PUBLICATIONS**Publications in journals**

S. No	Authors	Year	Title	Journal
1	R Ramesh	2017-18	Control measures of Mealy bug in Coconut	Thinamani, Velanmani ulagam-18.05.2017
2	R Ramesh	2017-18	Insect species attack in Coconut	Thinamalar-Vivasaya malar-07.05.2017
3	R Ramesh	2017-18	Insect species attack in Coconut	Thinamalar-Vivasaya malar-14.05.2017
4	R Ramesh	2017-18	Pests in Pulses	PachaiBoomi ,June'17, P.no-12
5	R Ramesh	2017-18	Pattu puluvai thakkum oosi ee	Thinamalar-Vivasaya malar-18.06.2017

6	R Ramesh	2017-18	Control measures of Mealy bug in Coconut	Thinamalar-Vivasaya malar-16.07.2017
7	R Ramesh	2017-18	Nerpayiril Uzhaviyal Murai Poochik kattupattu muraikal	Malarum velanmai vol-16.(8) p.no-14-17
8	R Ramesh	2017-18	Pattu puzhuvai thakkum Oosi Ee kattupattuthum muraikal	Malarum velanmai vol-16.(8) p.no-59-61
9	R Ramesh	2017-18	Control measures of Rhinoceros beetle in Coconut	PachaiBoomi ,August,17 P.no-30
10	R Ramesh	2017-18	Traditional Paddy varieties	Thinamalar-Vivasaya malar-09.08.2017
11	R Ramesh	2017-18	Suitable Rice varieties for Samba and Thaladi season	Thinamalar-Vivasaya malar-20.08.2017
12	R Ramesh	2017-18	Pest management in Pulses	Malarum velanmai vol-16.(9) August'17 P.no-25-28
13	R Ramesh	2017-18	Suitable Rice varieties for Samba and Thaladi season	Thinamalar-Vivasaya malar-27.08.2017
14	S.Saravanan, R Ramesh, P.Jagadeesan	2017-18	Munnetra vazhvirukku Muyal valarppu	Malarum velanmai vol-16.(9) p.no-17-19
15	R Ramesh, and A. Baskaran	2017-18	Organic pest management in Paddy cultivation .	Thinamani, Velanmani ulagam-12.10.2017
16	R Ramesh, and A. Baskaran	2017-18	Control measures of Grasshopper in Paddy field	Thinamani,16.10.2017
17	R Ramesh	2017-18	Benefits of Seed treatment in Paddy seed	MSSRF-Namma ooru seithi-2017,6(3) 01.11.2017
18	R Ramesh	2017-18	Rice fallow pulses cultivation techniques	PachaiBoomi ,January,18 P.no,44-45
19	R Ramesh	2017-18	Pest management in Cotton	PachaiBoomi ,February,18 P.no,42-45
20	R Ramesh	2017-18	Pest management in Paddy	Thinamalar-Vivasayamalar-28.01.2018
21	R Ramesh	2017-18	Pest management in Paddy	Thinamalar-Vivasayamalar-04.02.2018

20	R Ramesh	2017-18	Pest management in Paddy	Thinamalar-Vivasayamalar-28.01.2018
21	R Ramesh	2017-18	Pest management in Paddy	Thinamalar-Vivasayamalar-04.02.2018
22	R Ramesh	2017-18	Pest management in Rice fallow pulses	PachaiBoomi ,March,18 P.no,32-34
23	R Ramesh	2017-18	Rice fallow pulses cultivation techniques	Thinamani, Velanmani ulagam-08.03.2018
24	R Ramesh	2017-18	Nerpayire Thakkum nanmai seiyum Poochikal	Malarum velanmai vol-19.(1) p.no-7-9
25	R Ramesh and B.S.Sanmugam	2017-18	Nerpayirin Eyarkai kaavalan Silanthikal	Ulavarin Valarum Velanmai vol-1.(5) p.no-45-50
26	R Ramesh	2017-18	Nerpayire thakkum Elaisuruttu puzhukkal	Pachaboomi,November,17 p.no-38
27	R Ramesh and S.Saravanan	2017-18	Fodder crops	Thinamalar-Vivasayamalar-12.11.2018
28	R Ramesh and S.Saravanan	2017-18	Fodder crops	Thinamalar-Vivasayamalar-19.11.2018
29	R Ramesh	2017-18	Fodder crops	Naveena Velanmai,December'17 P.NO-8-11
30	R Ramesh	2017-18	Pattupuzhuvai thaakkum sunnakatti Noi	Pachaboomi,December,17 p.no-19
31	R Ramesh	2017-18	Mazhaikalankalil Nerpayire Paathukakkum vazhimuraikal	Thinamalar-Vivasayamalar-03.12.2018
32	R Ramesh	2017-18	Nerpayiril Elaikarukal noithaakkuthal	Thinamalar-Vivasayamalar-Uzhagam-21.12.2018
33	R Ramesh	2017-18	Nerpayiril Ner pazha Noi Melanmai	Dinamani,05.12.2017
34	R Ramesh and A.Baskaran	2017-18	Nerpayiril kuruthu poochi thakkuthalai kattupattuthum muraikal	Thinamani, Velanmani ulagam-08.03.2018
35	R Ramesh	2017-18	Nerpayire thakkum Elaisuruttu puzhukkal	Thinamani, Velanmani ulagam-08.03.2018

Other publications

S.No	Item	Year	Authors	Title	Publisher
1	Training manuals	2017-18	R Ramesh, A. Baskaran D.Reka R.Sakunthala D.Nakkiran	Soil Health Card	KVK-Thiruvarur
		2017-18	R Ramesh, A. Baskaran D.Reka R.Sakunthala D.Nakkiran	Soil sampling methods	KVK-Thiruvarur
2	Conference, proceeding papers, popular articles, Bulletins, Short communications				
a	Conference	2017-18	R. Ramesh	3 rd National Tamil conference (20.08.2017 to 13.08.17)	TNAU Coimbatore
		2017-18	A. Baskaran	Scientific workers conference (17.08.2017 to 18.08.2017)	TNAU Coimbatore
		2017-18	R. Ramesh	International conference on Biological control and sustainable insect pest management (29.01.2018-31.01.2018)	AC & RI , Killikulam
		2017-18	R. Ramesh	International conference INTFES-18	TNAU Coimbatore
		2017-18	A. Baskaran	National conference on KVK	New Delhi
b	Abstract	2017-18	R. Ramesh R. Baskaran A. Baskaran	Natural method of insect pest management in Paddy eco system in Cauvery Delta	-

		2017-18	R. Ramesh A. Baskaran	Popularizing climatic resilient Paddy varieties in Cauvery Delta district under NICRA	NICRA -Hydrabad
5	Technical bulletin/ Folders				
i	Booklet	2017-18	R Ramesh, A. Baskaran	Mazhaikalankalil Nerpayire paathukakkum muraikal	KVK-Thiruvarur
ii	Booklet	2017-18	R Ramesh, A. Baskaran D.Reka R.Sakunthala D.Nakkiran	Soil sampling methods	KVK-Thiruvarur
iii	Folder	2017-18	R Ramesh, A. Baskaran D.Reka R.Sakunthala D.Nakkiran	Soil Health Card	KVK-Thiruvarur
iv	Booklet	2017-18	R Ramesh, A. Baskaran	Payir paathukappu marunthukalai payanpathum pothu kadai pitikkai vendavai	KVK-Thiruvarur
v	Folder	2017-18	R Ramesh, A. Baskaran D.Nakkiran	Bee Keeping	KVK-Thiruvarur
vi	Booklet	2017-18	R Ramesh, A. Baskaran D.Nakkiran	Control measures of Paarthinim	KVK-Thiruvarur
vii	Booklet	2017-18	R Ramesh, A. Baskaran	Thavara ragangal matrum Uzhavarkalin Urimaikal sattam- 2001	KVK-Thiruvarur
viii	Booklet	2017-18	R Ramesh, A. Baskaran	Rice fallow pulses cultivation techniques	KVK-Thiruvarur

Newsletter/Magazine

Name of News letter/Magazine	Frequency	No. of Copies printed for distribution
Nerkalanjam	Quarterly	100

Newspaper coverage

Dailies/Title	Scientists	Date
Dinamalar-Control measures of Mealybug in Cotton	R. Ramesh , A.Baskaran	12.04.2017
Dinamani-Control measures of Mealybug in Cotton	R. Ramesh , A.Baskaran	13.04.2017
Dinamalar- Demo on Control measures of Mealybug in Cotton	R. Ramesh	03.05.2017
Dinamani-Control measures of sucking pest in Cotton	R. Ramesh	04.05.2017
Dinamani-Blackgram seed available at KVK,Needamangalam	R. Ramesh A.Baskaran D.Nakkiran	06.05.2017
Dinamalar-Blackgram seed available at KVK,Needamangalam	R. Ramesh A.Baskaran D.Nakkiran	06.05.2017
Dinamalar-Kuthiraivali cultivation techniques	R. Ramesh A.Baskaran	06.05.2017
Dinamani-Control measures of Mealybug in Cotton	R. Ramesh A.Baskaran	08.05.2017
Dinamalar- Control measures of Mealybug in Cotton	R. Ramesh A.Baskaran	18.05.2017
Dinamalar-Control measures of sucking pest in Cotton	R. Ramesh A.Baskaran	20.05.2017
Dinamalar-Demo on High yield cultivation techniques in Pulses	R. Ramesh A.Baskaran	01.06.2017
Dinamani-Demo on High yield cultivation techniques in Pulses	R. Ramesh A.Baskaran	01.06.2017
Dinamalar- Control measures of Mealybug in Cotton	R. Ramesh A.Baskaran	04.06.2017
Dinamani-Control measures of Mealybug in Cotton	R. Ramesh A.Baskaran	04.06.2017
Dinathanthi- Control measures of Mealybug in Cotton	R. Ramesh A.Baskaran	05.06.2017
Dinakaran-Field diagnostic visit at Thenpathi	R. Ramesh A.Baskaran	08.06.2917
Dinamani-Field diagnostic visit at Thenpathi	R. Ramesh A.Baskaran	08.06.2917

Dinakaran- Control measures of Mealybug in Cotton	R. Ramesh A.Baskaran	10.06.2017
Dinamani-Training on Pest and Disease management	R. Ramesh A.Baskaran	13.06.2017
Dinamalar-Training on Pest and Disease management	R. Ramesh A.Baskaran	14.06.2017
Dinaboomi- Field diagnostic visit at Thenpathi	R. Ramesh A.Baskaran	14.06.2017
Dinamani-High tech cultivation techniques in Paddy	R. Ramesh A.Baskaran	15.06.2017
Dinakaran-Training on Pest and Disease management	R. Ramesh A.Baskaran	15.06.2017
Dinaboomi-Training on Pest and Disease management in pulses at Pullavarayankudikadu	R. Ramesh A.Baskaran	15.06.2017
Dinamalar-Field diagnostic visit for FLD cotton	R. Ramesh A.Baskaran	21.06.2017
Dinakaran-Field diagnostic visit for FLD cotton at Koradacheri	R. Ramesh A.Baskaran	21.06.2017
Dinamani-Field diagnostic visit for FLD cotton	R. Ramesh A.Baskaran	21.06.2017
Dinamani- Awareness programme on Popularization of alternate crop Maize in Cauvery delda zone	R. Ramesh A.Baskaran	22.06.2017
Dinamalar- Awareness programme on Popularization of alternate crop Maize in Cauvery delda zone	R. Ramesh A.Baskaran	22.06.2017
Dinamalar-Maize field diagnostic visit	R. Ramesh A.Baskaran	06.07.2017
Dinamalar-Barnyard millet cultivation techniques	R. Ramesh A.Baskaran	06.07.2017
Dinamani-Barnyard millet fied visit	R. Ramesh A.Baskaran	06.07.2017
Dinamani-Field diagnostic visit in Cotton	R. Ramesh A.Baskaran	07.07.2017
Dinamani-Training on High yielding technologies for Millets	R. Ramesh A.Baskaran	10.07.2017
Dinamani-Maize field diagnostic visit	R. Ramesh A.Baskaran	20.07.2017
Dinamalar-Control measures of Stem borer in Maize	R. Ramesh A.Baskaran	20.07.2017
Dinakaran-Maize field diagnostic visit	R. Ramesh A.Baskaran	22.07.2017
Dinamalar-Suitable paddy varieties for Kuruvai season	R. Ramesh A.Baskaran	26.07.2017

Dinamani-Nutrient management in Paddy	R. Ramesh A.Baskaran	26.07.2017
Dinamani-Production of Quality seedlings for Kuruvai season	R. Ramesh A.Baskaran	29.07.2017
Dinamani-Field day in Barnyard Millets field	R. Ramesh A.Baskaran	02.08.2017
Dinamalar-Field day in Barnyard Millets field	R. Ramesh A.Baskaran	03.08.2017
Dinathanthi-Field day in Barnyard Millets field	R. Ramesh A.Baskaran	03.08.2017
Dinamalar-Organic pest management in Paddy-Using Pseudomonase	R. Ramesh A.Baskaran	06.08.2017
Dinamalar-Maize is alternate crop for Kuruvai season	R. Ramesh A.Baskaran	13.08.2017
Dinamani-Maize is alternate crop for Kuruvai season	R. Ramesh A.Baskaran	13.08.2017
Dinakaran-Maize is alternate crop for Kuruvai season	R. Ramesh A.Baskaran	14.08.2017
Dinamani-Training on Bee keeping at KVK,Needamangalam	R. Ramesh A.Baskaran	23.08.2017
Dinamani-Training on pudukottai farmers	R. Ramesh A.Baskaran	07.09.2017
Dinamalar-Paddy transplanting done in KVK,Needamangalam	R. Ramesh A.Baskaran	11.09.2017
Dinamani-Director of Agriculture Visit at KVK,Needamangalam	R. Ramesh A.Baskaran	11.09.2017
Dinamani-Flood tolerant Paddy seed variety distribution	R. Ramesh A.Baskaran	12.09.2017
Dinamani-Echankottai College Agri students stay at KVK,Needamangalam for RAWI programme	R. Ramesh A.Baskaran	14.09.2017
Dinamalar- Echankottai College Agri students stay at KVK,Needamangalam for RAWI programme	R. Ramesh A.Baskaran	15.09.2017
Dinamani-Training on Disease management in Paddy	R. Ramesh A.Baskaran	18.09.2017
Dinamalar-Flood tolerant Paddy seed variety distribution	R. Ramesh A.Baskaran	18.09.2017
Dinakaran-Flood tolerant Paddy seed variety distribution	R. Ramesh A.Baskaran	18.09.2017
Dinamani-NICRA scheme -ATARI scientist review	R. Ramesh A.Baskaran	22.09.2017
Dinamalar-NICRA scheme -ATARI scientist review	R. Ramesh A.Baskaran	25.09.2017

Dinamani-Paddy field diagnostic visit at Keelapattu village	R. Ramesh A.Baskaran	04.10.2017
Dinathanthi-Paddy field diagnostic visit at Keelapattu village	R. Ramesh A.Baskaran	04.10.2017
The Hindu-Prevention methods for Grass hoper affected field	R. Ramesh A.Baskaran	05.10.2017
Dinamalar- Prevention methods for Grass hoper affected field	R. Ramesh A.Baskaran	06.10.2017
Dinamalar- Field diagnostic visit- Grass hoper affected paddy field	R. Ramesh A.Baskaran	06.10.2017
Dinakaran- Field diagnostic visit- Grass hoper affected paddy field at near Muthupettai	R. Ramesh A.Baskaran	06.10.2017
Dinathanthi-Training on control measures of Grasshopper	R. Ramesh A.Baskaran	06.10.2017
Dinamani-Training on control measures of Grasshopper	R. Ramesh A.Baskaran	06.10.2017
Dinakaran-Training on control measures of Grasshopper	R. Ramesh A.Baskaran	06.10.2017
Dinamani- Field diagnostic visit at near Muthupettai	R. Ramesh A.Baskaran	07.10.2017
Dinamani- Prevention methods for Grass hoper affected field	R. Ramesh A.Baskaran	07.10.2017
Dinakaran- Prevention methods for Grass hoper affected field	R. Ramesh A.Baskaran	07.10.2017
Dinamalar- Prevention methods for Grass hoper affected field	R. Ramesh A.Baskaran	10.10.2017
Dinamalar - TNAMP-Maize cultivation techniques	R. Ramesh A.Baskaran	11.10.2018
Thinathanthi- Field day at Aathanur village	R. Ramesh A.Baskaran	11.10.2017
Thinakaran - Field day at Aathanur village	R. Ramesh A.Baskaran	14.10.2017
Dinamani- Prevention methods for Grass hoper affected field	R. Ramesh A.Baskaran	16.10.2017
Dinamalar- Maize cultivation techniques	R. Ramesh A.Baskaran	22.10.2017
Dinamalar- Pheromone trap using for Pest management	R. Ramesh A.Baskaran	23.10.2017
Dinamani-Nel vayalil poochikalai kattupatutha paravai erukkai amaithal	R. Ramesh A.Baskaran	26.10.2017
Dinakaran-Nel vayalil poochikalai kattupatutha paravai erukkai amaithal	R. Ramesh A.Baskaran	27.10.2017

Dinamani-Malaikalankalil Nerpayire paathukaakkum muraikal	R. Ramesh A.Baskaran	30.10.2017
Dinamanilar-Malaikalankalil Nerpayire paathukaakkum muraikal	R. Ramesh A.Baskaran	31.10.2017
Dinamani-Vellathal pathikkapatum Payirukku Ootachathu	R. Ramesh A.Baskaran	31.10.2017
Dinamani-Alternate crop Maize for Kuruvai season	R. Ramesh A.Baskaran	01.11.2017
Dinakaran-Pallakal pakuthikalil Neeril muzhki Pathikkapatum Payirkalai kaappathu eppadi	R. Ramesh A.Baskaran	04.11.2017
Dinamani- Vigilance awareness programme	R. Ramesh A.Baskaran	05.11.2017
Dinamani-Field diagnostic visit	R. Ramesh A.Baskaran	08.11.2017
Dinamani-Paddy nursery field diagnostic visit	R. Ramesh A.Baskaran	10.11.2017
Dinamanikaran- Grass hopper affected Paddy nursery field	R. Ramesh A.Baskaran	10.11.2017
Dinamani- Malaikalankalil Nerpayire paathukaakkum muraikal	R. Ramesh A.Baskaran	11.11.2017
Dinamani-Demo on Organic Pesticide spray	R. Ramesh A.Baskaran	12.11.2017
Dinamani-Maize harvest	R. Ramesh A.Baskaran	13.11.2017
Dinamalar- Maize harvest	R. Ramesh A.Baskaran	13.11.2017
Thinathanthi- Maize harvest at Needamangalam	R. Ramesh A.Baskaran	13.11.2017
Dinamalar-Training on Extension officials	R. Ramesh A.Baskaran	16.11.2017
Dinamani-Field diagnostic visit	R. Ramesh A.Baskaran	18.11.2017
Dinakaran-Mushroom cultivation training	D.Reka A.Baskaran	18.11.2017
Dinamani-Mushroom cultivation training	D.Reka A.Baskaran	19.11.2017
Thinathanthi-Mushroom cultivation training	D.Reka A.Baskaran	19.11.2017
Dinamani-Training on IPDM	R. Ramesh A.Baskaran	20.11.2017
Dinamani- Pheromone trap using for Pest management	R. Ramesh A.Baskaran	23.11.2017

Dinakaran- Pheromone trap using for Pest management	R. Ramesh A.Baskaran	25.11.2017
Dinamni-Training on Coconut IPM	R. Ramesh A.Baskaran	25.11.2017
Dinamalar-Nerpayiril Aanaikompan Ee thakkalaik kattupathum muraikal	R. Ramesh A.Baskaran	29.11.2017
Dinamalar-Nerpayiril Punchan virus noi thaakkuthal	R. Ramesh A.Baskaran	03.12.2017
Dinamani- Nerpazha noi melanmai in samba thaladi payir	R. Ramesh A.Baskaran	03.12.2017
Dinamani- Review meeting at KVK	R. Ramesh A.Baskaran	14.12.2017
Dinamani- Field diagnostic visit	R. Ramesh A.Baskaran	16.12.2017
Dinamalar-Demo on coconut pheromone trap	R. Ramesh A.Baskaran	19.12.2017
Thinathanthi- Field diagnostic visit	R. Ramesh A.Baskaran	21.12.2017
Dinamani- Field diagnostic visit	R. Ramesh A.Baskaran	30.12.2017
Dinamalar- Field diagnostic visit	R. Ramesh A.Baskaran	31.12.2017
Dinamani-Training on Organic Agriculture	R. Ramesh A.Baskaran	11.01.2018
Dinakaran-Velan thozhilnutpa payirchi	R. Ramesh A.Baskaran	20.01.2018
Dinamani- High tech cultivation techniques in pulses production	R. Ramesh A.Baskaran	20.01.2018
Dinamalar-Nerpayiril Pchai thathupoochi kattupathum muraikal	R. Ramesh A.Baskaran	25.01.2018
Dinakaran-Field diagnostic visit at Kottur	R. Ramesh A.Baskaran	27.01.2018
Dinaboomi-PPVFRA Campaign	R. Ramesh A.Baskaran	08.02.2018
Tamilsudar-PPVFRA programme	R. Ramesh A.Baskaran	08.02.2018
Dinamalar- Traditional paddy variety	R. Ramesh A.Baskaran	08.02.2018
Dinakaran-Traditional paddy variety cultivation techniques	R. Ramesh A.Baskaran	12.02.2018
Dinamani- Pest attack in Coconut	R. Ramesh A.Baskaran	13.02.2018

Dinamalar- Pest attack in Coconut	R. Ramesh	14.02.2018
Dinakaran- Control measures of Pest attack in Coconut	R. Ramesh A.Baskaran	15.02.2018
Dinakaran-Rice fallow pulses cultivation techniques	R. Ramesh A.Baskaran	18.02.2018
Dinamani-Rice fallow pulses cultivation techniques	R. Ramesh A.Baskaran	18.02.2018
Dinamani- Demo on Seed treatment	R. Ramesh A.Baskaran	21.02.2018
Dinathanthi- Demo on Seed treatment	R. Ramesh A.Baskaran	21.02.2018
Dinakaran- Demo on Seed treatment	R. Ramesh A.Baskaran	21.02.2018
Thinathanthi- Blackgram seed distribution to Farmers	R. Ramesh A.Baskaran	23.02.2018
Dinamalar-IPM in Coconut	R. Ramesh A.Baskaran	24.02.2018
Dinakaran- Training on Rice fallow pulses cultivation techniques	R. Ramesh A.Baskaran	24.02.2018
Dinamani-Distribution Rice fallow Blackgram	R. Ramesh A.Baskaran	25.02.2018
Dinamalar-Distribution Rice fallow Blackgram	R. Ramesh A.Baskaran	25.02.2018
Dinakaran-IPM in Coconut	R. Ramesh A.Baskaran	26.02.2018
Dinamani-Awareness campaign on PPV & FRA	R. Ramesh A.Baskaran	18.03.2018
Dinathanthi-Awareness campaign on PPV & FRA	R. Ramesh A.Baskaran	19.03.2018
Dinakaran-Awareness campaign on PPV & FRA	R. Ramesh A.Baskaran	20.03.2018
Dinamani- Training on Rice fallow pulses cultivation techniques-TN-IAMP	R. Ramesh A.Baskaran	22.03.2018
Dinamalar- Training on Rice fallow pulses cultivation techniques-TN-IAMP	R. Ramesh A.Baskaran	22.03.2018
Dinakaran- Training on Rice fallow pulses cultivation techniques-TN-IAMP	R. Ramesh A.Baskaran	23.03.2018

Important visitors to KVK, Thiruvarur

The KVK, Thiruvarur was visited regularly by many Officials for its significant contribution TOT activities in Thiruvarur district. The following are the notable visitors

Date	Name, Designation and Institution of the Visitors
26.05.2017	Honourable Vice Chancellor,TNAU , Coimbatore Dr.V.Ravi, Director, TRRI, Aduthurai
21.06.2017	Dr.V.Ravi, Director, TRRI, Aduthurai
19.07.2017	JDA(NFSM),Director of Agriculture,Chennai
29.08.2017	Th,L.Nirmal Raj,IAS, District Collector, Thiruvarur
08.09.2018	Th.V.Dhekshnamoorthi,Director of Agriculture Th,L.Nirmal Raj,IAS, District Collector, Thiruvarur
11.09.2018	Dr.H.Philip, DEE, TNAU, Coimbatore Dr.V.Ravi, Director, TRRI, Aduthurai Dr.P.Pandiyarajan, Dean, ADAC & RI, Coimbore Er.K.Senthilkumar,Estate Officer
21.09.2018	Dr. Y.G.Prasad,Director,ATARI,Zone-X Dr.H.Philip, DEE, TNAU, Coimbatore
25.10.2017	Er.Abdul Rasheed,Director,IMTI,Thuvakudi
05.12.2017	Dr.M.Pandian,Dean,Agricultural College and Research Institute,Thanjavur
31.01.2018	Honourable Vice Chancellor,TNAU , Coimbatore

Training/workshops/seminars etc details attended by KVK staff

Name of the staff	Title	Duration	Organized by
Dr. A. Baskaran	Annual Review Workshop (2016-17)	02.05.2017-09.05.2017	KVK, North Goa
Dr.A.Baskaran Dr. R. Ramesh	SBGF Review Meeting	16.06.2017	TNAU,Coimbatore
Dr.A.Baskaran Dr. R. Ramesh	NICRA Annual review meet and Annual action plan	10.07.2017-15.07.2017	ATARI, Zone X, Hyderabad
Dr. A. Baskaran	National Banana festival	20.07.2017 - 23.07.2017	CII, AC &RI, Madurai
Dr. R. Ramesh	District Level Monitoring Committee (DLMC) meeting	21.07.2017	Collectorate, Thiruvarur

Dr. R. Ramesh	TN-IAMP Project Planning Workshop	27.07.2017	TNAU, Coimbatore
Dr. R. Ramesh	3 rd National Tamil Conference	12.08.2017-13.08.2017	TNAU, Coimbatore
Dr. A. Baskaran	Scientific Workers Conference	17.08.2017 - 18.08.2017	TNAU, Coimbatore
Dr. R.Ramesh	TN IAMP scheme Action Plan Brainstorming meeting	27.09.2017	TNAU, Coimbatore
Dr. R.Ramesh	TN IAMP scheme Review meeting on the Field activities	20.10.2017	SWMRI, Thanjavur
Dr. R. Ramesh	Training on Remote sensing GIS	04.12.2017 - 07.12.2017	TNAU, Coimbatore
Dr. R. Ramesh	National Conference on New Vistas in Vegetable Research towards Nutritional Security under Changing Climate Scenario	06.12.2017-09.12.2017	TNAU, Coimbatore
Dr. A.Baskaran	National Level Training programme on Cocoa	13.12.2017-16.12.2017	Cochin
Th.D.Senthilkumar	TNIAMP-Financial Management Workshop	08.01.2018	TNAU, Coimbatore
Dr. R. Ramesh	TN-IAMP meeting	09.01.2018	TNAU, Coimbatore
Dr. A.Baskaran	Kharif review & Rabi progress workshop of NICRA KVKs	10.01.2018-11.01.2018	Hydrabad
Dr. R. Ramesh	TN-IAMP meeting	22.01.2018	Mayiladuthurai
Dr. R.Ramesh	International Conference on Biological Control and Sustainable Insect Pest Management	29.01.2018-31.01.2018	AC&RI, Killikulam
Dr. R.Ramesh	TVR Ayyar Memorial Lecture and Workshop on Entomology and Entrepreneurship	13.02.2018	AC & RI, Madurai
Dr. A.Baskaran	Interface meeting on Agriculture-SAME- SSEPERS-ATMA- Preparation of SWEP- for the year 2018-19	20.02.2018-23.02.2018	Kodaikanal
Dr.R.Ramesh	International Conference INTFES-18 organized by DEE, TNAU, Coimbatore	08.03.2018-11.03.2018	TNAU, Coimbatore
Dr. A. Baskaran	National Conference on KVK	15.03.2018-17.03.2018	New Delhi
Dr.R.Ramesh	TN-IAMP Review meeting	21.03.2018	TNAU,Coimbatore

DR.A.Baskaran Dr.R.Ramesh Dr.J.Vanithasri	Pre Action Plan meeting	27.03.2018	TNAU, Coimbatore
---	-------------------------	------------	---------------------

11. DETAILS ON RAIN WATER HARVESTING STRUCTURE AND MICRO-IRRIGATION SYSTEM : Nil

12. INTERVENTIONS ON DISASTER MANAGEMENT/UNSEASONAL RAINFALL /HAILSTORM/COLD WAVES ETC

Awareness campaign

	Meetings		Gosthies		Field days		Farmers fair		Exhibition		Film show	
	No.	No.of farmers	No.	No.of farmers	No.	No.of farmers	No.	No.of farmers	No.	No.of farmers	No.	No.of farmers
	4	136	0	0	3	122	3	222	9	5718	0	0
Total	4	136	0	0	3	122	3	222	9	5718	0	0

13. Awards/rewards by KVK and staff

Recognitions & Awards/Special attainments and Achievements of Practical Importance			
Recognitions & Awards (Team Award/ individual			
Item of Recognition	Year	Awarding Organization National / International / Professional; Society	Individual/ collaborative
Best Book Award 2017	2017	Agricultural Scientific Tamil Society, New Delhi	Individual
Best Popular Article Award 2017	2017	Agricultural Scientific Tamil Society, New Delhi	Individual
Special Award for more number of Popular Articles in Tamil	2017	Agricultural Scientific Tamil Society, New Delhi	Individual
Best Poster presentation Award	2018	International Conference on Invigorating Transformation of Farm Extension towards Sustainable Development :Futuristic Challenges and Prospects - INTFES 2018	Individual

14. Details of sponsored projects/programmes implemented by KVK

S.No	Title of the programme / project	Sponsoring agency	Objectives	Duration	Amount (Rs in lakhs)
1	SPC - SBGF Project	State Planning Commission -SPGF	<ul style="list-style-type: none"> ➤ Retrieval of millets in Thiruvarur District ➤ Value addition in millets for entrepreneurship development 	Feb 2015- March 2018	16.15

2	TN-IAMP	World Bank through Govt of Tamil Nadu	<ul style="list-style-type: none"> ➤ Introduction of Maize as an alternate crop during Kuruvai season ➤ Water saving in paddy using field water tubes 	April, 2017- March 2018	18.18
3	NICRA	ICAR	<ul style="list-style-type: none"> ➤ Introduction of Climate resistant varieties - flood tolerant varieties CR 1009 sub1 and Swarna Sub1 ➤ Natural Resources management 	April 2017- March 2018	7.90

1.Revival of Millets in Cauvery Delta through Capacity Building on Improved Production Technologies and Value Addition in Millets

During the farmers interactive meetings conducted by KVK, it was observed that the farmers previously cultivated millets and cultivation of rice has replaced the millets during the last 4-5 decades and obvious reasons like change in life style, increase in per capita income etc could be attributed to this change. Due to prolonged exclusion of millets in the dietary schedule, increased incidence of anaemia and nutritional related disorders become omnipresent in the backward blocks thereby affecting the vital health parameters like IMR, MMR, etc.

Presently the resource poor farmers are not aware of improved production technologies for increasing the production and productivity of millets as the cultivation of millets became an obsolete practice and there exists a potential demand for revival back of Millets in Cauvery Delta. The need for creating awareness among the farmers is felt necessary as consumption of millets would confer substantial nutritional benefits to the farmers.

Millet were once mainly cultivated under rainfed condition with little water management in this block thereby pressure on need for water was ingeniously managed. Nowadays, the area under rice cultivation has become exponentially large and water stress conditions grew geometrically which has serious repercussions on the agriculture in the delta. Moreover, the farmers do not possess enough awareness of the latest varieties and hybrids and improved production technologies for increasing the yield in millets. In addition to this, awareness on minimal processing and value addition is very low among the farmers which constrain the sustainability of their livelihood.

Most of the programmes implemented in this area did not address/focus this particular issue as much emphasis has been given only on rice in the delta. The efforts

taken by the department of agriculture and Tamil Nadu Agricultural University in popularising millets has percolated and now increased awareness on millets has emerged potentially.

The prime objective is to bring back millets in the Cauvery Delta as the cultivation of millets was in vogue during 4-5 decades back. With this in view, the project envisages for increase the per capita income of the resource poor farmers on hand and ensuring better nutrient security to them. There is a set of practices are introduced in this area to revive the production of millet crops and value addition of millets to fetch good market price for these products through generation of employment opportunities by adoption of millets processing activities.

2.NICRA (National Innovation on Climate Resilient Agriculture)

Climate change has become an important area of concern for India to ensure food and nutritional security for growing population. The impacts of climate change are global, but countries like India are more vulnerable in view of the high population depending on agriculture. The technology demonstration component deals with demonstrating proven technologies for adaptation of crop and livestock production systems to climate variability. This component is implemented in selected vulnerable districts of the country through location specific interventions by ICAR, Krishi Vigyan Kendra's in a participatory mode. The main objectives are to enhance the resilience of Indian agriculture covering crops and livestock and fisheries to climatic variability and climatic change through development and application of improved production and risk management technologies, to demonstrate site specific technology package on farmers field to adapting to current climatic risk and to enhance the capacity building o scientists and other stake holders in climate resilient agricultural research and its application.

Module I: Natural resources

This module consists of interventions related to in-situ moisture conservation, water harvesting, supplemental irrigation, improved drainage in flood prone areas, conservation tillage where appropriate, artificial ground water recharge and water saving irrigation methods.

Module II: Crop Production

This module consists of introducing drought/temperature/flood tolerant varieties, water saving paddy cultivation methods (SRI), custom hiring centres for timely planting, location specific intercropping systems with high sustainable yield index.

Module III: Livestock and Fisheries

Use of community lands for fodder production during droughts/floods, improved fodder/feed storage methods, preventive vaccination, improved shelters for reducing heat stress in livestock , management of fish ponds/tanks during water scarcity and excess water, etc.

Module IV: Institutional Interventions

This module consist of institutional interventions relating to seed bank, fodder bank, commodity groups, custom hiring centre, collective marketing, introduction of weather index based insurance and climate literacy through a village level weather station.

The village Rayapuram was selected for implementing this project. The main problem encountered during this season is submergence of paddy crop for about 10 to 15 days due to high intensive rainfall and cyclones during the period. The flood proneness was tackled by providing flood tolerant varieties CR 1009 Sub 1 under Crop Production Module. In this programme, seeds of flood tolerant varieties CR 1009 Sub 1 during Samba season and Swarna Sub 1 during Thaladi season were provided to the farmers.

3.Tamil Nadu- Irrigated Agriculture Modernization Project (TN IAMP)

The major production constraints that are met with in the CDZ such as i) Definite dates of opening and closing of Mettur Dam water for irrigation is not known. This reflects in planning of rice and rice based cropping system. ii) Torrential rains during North East Monsoon, hindering both kuruvai harvest as well as thaladi transplanting. iii) Monocrop of rice in the delta region coupled with unfavorable weather conditions in an year lead to heavy incidence of pests/diseases. iv) Labour shortage during peak season of harvesting or planting v) Lodging of rice crop leads to field germination. Lack of means to preserve kuruvai grain vi) Lack of adequate drainage facility in the delta region vii) Low light intensity prevailing in samba season results in poor yield

Crop diversification

Crop diversification in Cauvery command areas through innovative experiments of introducing new crops. N this module, Maize was introduced as an alternate crop during *Kuruvai* season 2017 and cultivated in 43 ha in Thiruvarur District.

Upscaling of Rice fallow Pulses


The farmers are getting very low yield due to non adoption of cultivation practices, improper foliar nutrient and Biofertilizer management in pulses. Growing of high yielding varieties with proper management practices helps to improve the productivity in pulses. During 2017-18, rice fallow pulses were cultivated in 75 ha in Thiruvarur District.

Enhancing TFL seed production under irrigated pulses

Non availability of quality seeds for cultivation of pulse crops during the peak season. Farmers are highly relying and purchase the seeds from the local traders, which fetches more price and also admixture in the seeds. TFS seed production under irrigated pulses in 25 ha in Thiruvarur District during 2017-18.

15. Success stories

Success Story of Maize as alternate crop during Kuruvai season in Thiruvarur District

1	Name of the Farmer	:	Th. G.Sathyamoorthy	
2	Address for communication with Pin code	:	S/o Govinthasamy South Street, Pathur Melkarai Koradacherry	
3	Contact Phone No		9941094539	
4	Details of Farm Holding/Water Resources		3 hectares One borewell & Canal water	

1.Situation analysis/Problem statement

Paddy cultivation during Kuruvai season is mostly dependent on cauvery river water. But release of cauvery water is uncertain during kuruvai season *i.e.* June –August. Hence, cultivation of paddy in larger area with limited water source is impractical during kuruvai season. Most of the farmers kept fallow during kuruvai season due to paucity of water. To overcome this situation, less water consuming crop maize was introduced as an alternate crop in Thiruvarur District. Paddy is the sole crop cultivated throughout Thiruvarur District, which consumes more water leads to less area under paddy during kuruvai season which ultimately affect the livelihood of the farmers as majority of farmers unable to cultivate paddy and those having borewell only used to cultivate paddy during kuruvai season that too less area.

2.Plan, Implement and Support:

During kuruvai season (June-July) he used to cultivate short duration paddy varieties. In recent past the water availability in Cauvery delta is not sure for the timely cultivation of paddy crop during Kuruvai season. KVK provided maize hybrid seeds to the farmers and regularly monitored his field and provided necessary technical support as and when required. He cultivated Maize as an alternate crop for kuruvai season during the year 2016-17 in 3 acres. The water used for maize cultivation was very less and more area was covered with less available water. In addition pest and disease incidence was very less, hence expenses towards plant protection measures was very limited. Moreover, as this crop maize is new to this area we even arranged marketing of maize grains.

It was widely covered and published in Newspapers like Dinamani, Dinamalar, Thinathanthi, Dinakaran and The Hindu (Tamil), All India Radio, Karaikkal. Technical

support and publicity was given in KVK Thiruvarur WhatsApp group of KVK farmers and Sent SMS through Kisan portal.

3.Output:

He obtained a yield of 45.5q/ha and got a gross income of Rs.56,875/ha and Rs.40125/ha as a net profit with B:C ration of 1:3.4.

4.Outcome:

Maize is the best alternate crop for kuruvai season in CDZ wherever water logging is not a problem. When water release in Mettur dam delayed during kuruvai season, maize can be grown in larger area with limited water from bore well compared to paddy crop. He is now more confident in cultivating maize crop during kuruvai season.

5. Impact:

Success of maize cultivation in CDZ was recorded and broadcasted in All India Radio, Karaikkal. Many farmers from his village now eager to cultivate maize after seeing his success in maize cultivation not only with high returns but also less water consumption and comparatively less infestation of pest and diseases.

15. B. Give details of innovative methodology or innovative technology of Transfer of Technology developed and used during the year

The following are the innovative methodologies followed by scientists of KVK during 2016-17

1. **Pre and post evaluation of training:** To understand the knowledge level of participants before entry into a training programme a semi structured interview schedule was constructed and administered among the participants. This could be helpful for getting an idea about level of awareness/ understanding/ know how of participants. The post evaluation was also done to understand the effectiveness of the programme
2. **Kisan Mobile Advisory Service (KMAS):** The KVK, Thiruvarur has continuous efforts to disseminate latest and timely information to the farming community through Kisan Mobile Advisory Service (KMAS)
3. **Farmers SMS portal :** The KVK, Thiruvarur has started disseminating latest and timely information to the farming community through Farmers SMS portal
4. **Local Cable Network Channel:** The KVK, Thiruvarur has timely delivered the crop management practices to the farming community through Local Cable Network Channel

5. **Media coverage:** Regular farm advisory / forewarning messages and the mandated activities of KVK Thiruvarur are being published through local dailies as well as All India Radio Trichirapalli and Karaikkal

15. C. Give details of indigenous technology practiced by the farmers in the KVK operational area which can be considered for technology development :Nil

16. IMPACT

16.A. Impact of KVK activities : Nil

16.B. Cases of large scale adoption: Nil

16.C. Details of impact analysis of KVK activities carried out during the reporting period : Nil

17. LINKAGES

17.A. Functional linkage with different organizations

Name of organization	Nature of linkage
NABARD	Participation in Meeting and conduct of Training on crop production and precision technology of Agricultural and allied sectors.
SPGF	FLD on millets and its value addition
Department of Agriculture	Monthly Zonal Workshop, Field survey , Diagnostic Visit, Joint implementation, Participation in Meeting and conduct of Training on crop production and Protection technologies of mandatory crops of Agricultural crops.
Department of Horticulture	Field survey, Diagnostic Visit, Joint implementation, Participation in Meeting and conduct of Training on crop production and Protection technologies of Horticultural crops.
Department of Agriculture Engineering	Participation in Meeting and conduct of Training on crop production and precision technology of Agricultural and Horticultural crops.
Department of Animal Husbandary	Field survey, Diagnostic Visit, Joint implementation, Participation in Meeting and conduct of Training on crop production and Protection technologies of Cattle, Goat and Poultry.
Department of Fishery	Field survey, Diagnostic Visit, Joint implementation, Participation in Meeting and conduct of Training on Fishery technology.
Department of Forestry	Field survey, Diagnostic Visit, Joint implementation, Participation in Meeting and conduct of Training on trees.

Department of Sericulture	Field survey, Diagnostic Visit, Participation in Meeting and conduct of Training on mulberry and silkworm.
Department of Agricultural Marketing and Agriculture Business	Participation in Meeting and conduct of Training on regulated market committee and storage.
District Administration -Thiruvarur	Technological backstopping during Farmers grievance day of every third Thursday of the month.
Indian Institute of Food Processing and Technology, Thanjavur	Training to farmers, Rural Youth and data analysis for value addition, post harvest and processing.

17.B. List special programmes undertaken by the KVK and operational now, which have been financed by State Govt./Other Agencies

Name of the scheme	Date/ Month of initiation	Funding agency	Amount (Rs.in lakhs)
SBGF - Revival of millets in Cauvery Delta	Feb, 2015- March 2018	State Planning Commission - SPGF	16.15
TNIAMP- Tamil Nadu Irrigated Agriculture Modernization Project	April 2017- March 2018	World Bank through Govt of Tamil Nadu	18.18

-----XXXXXXXX-----

Annexure-I

SAC proceedings along with list of participants

The 7th Scientific Advisory Committee Meeting of ICAR-Krishi Vigyan Kendra, Needamangalam was held at KVK, Needamangalam on 22.09.2016. Dr. H.Philip, Director of Extension Education, TNAU, Coimbatore, presided over the function. Dr. V.Ravi, Director, TRRI, Aduthurai and Dr. P.Chandre Gowda, Principal Scientist, ICAR-ATARI, Bengaluru delivered special addresses.

The following official and non official members of Scientific Advisory Committee were participated in the meeting.

Official Members	1	Dr. H.Philip, DEE, TNAU, Coimabtoe-3.
	2	Dr. V.Ravi Director, TRRI, Aduthurai
	3	Dr. P.Chandre Gowda, Principal Scientist, ICAR - ATARI, on behalf of Dr.Sreenath Dixit, ICAR- ATARI, Bangalore-24.
	4	Dr. V.Kumar Principal Scientist ICAR-NRCB, Trichy
	5	Th.G,Ganesan, on behalf of Joint Director of Agriculture, Thiruvarur.
	6	Dr. K. Mohammad Usman Regional Joint Director of Animal Husbandry, Thiruvarur.
	7	Th. Patrick Jasper District Development Manager, NABARD, Thiruvarur
	8	Dr. M.Kadhirselman, Associate Professor and Head, Farmer Training Centre, TANUVAS, Thiruvarur.
	9	Th. A.E.Sureshkumar, Deputy Director of Horticulture, Thiruvarur.
	10	Th. M.Manokaran, Deputy Director (Marketing), Thiruvarur.
	11	Th.V. Duraisamy, Executive Engineer, Department of Agricultural Engineering, Thiruvarur.

	12	Th. A.Justin, Assistant Director of Agriculture, Needamangalam.
	13	Th. R.Sivaramakrishnan Lead District Manager (IOB) Thiruvarur.
	14	Th. P.Chinnasamy Programme Executive (Agri) All India Radio, Trichy
	15	Th. S.Radharishnan, Forest Ranger, on behalf of District Forest Officer Mannargudi.
	16	Th. R.Natarajan, Project Director District Industrial Centre, Thiruvarur.
	17	Th. L.Chandrasekaran, Assistant Director of Sericulture, Department. of Sericulture, Thiruvarur.
	18	Th. R.Renganthan Sub Inspector of Fisheries, Thiruvarur.
Non-official members	19	Th. D.Rajkumar, Devangudi Mannargudi.
	20	Th. M.Devamani Keluvathur
	21	Tmt.S.Abirami Valangaiman
	22	Tmt. K.Shanthi Poonthottam
Member Secretary	23	Dr. R.Baskaran Programme Coordinator KVK, Needamangalam. Thiruvarur-Dist

Scientists of ICAR-KVK, Needamangalam also participated in the meeting. Dr.R.Baskaran, Programme Coordinator, ICAR-KVK, Needamangalam, welcomed the gathering of the meeting and explained the action taken on the recommendations of the sixth SAC meeting conducted on 24.06.2013. He also presented the overview of ICAR-KVK and its mandatory activities since last SAC.

During the presidential address, the Respected Director of Extension Education, Dr. H.Philip appealed to SAC members to provide their valuable suggestions to be executed by ICAR-KVK for the welfare of the farmers of Thiruvarur District. He has

insisted that the ICAR-KVK and line departments to work together for uplifting the socio economic conditions of farmers of Thiruvarur District and asked to utilize the services of scientists from nearby research stations for conducting trainings, campaigns and field days and advised to ensure the availability of seeds and marketing facilities while conducting FLD's.

Dr. V.Ravi, Director, TRRI, Aduthurai has stressed to provide strategies to be adopted at every season and distress period through print media.

Dr. P.Chandre Gowda, Principal Scientist, ICAR-ATRI has appreciated the mode of conduct of SAC. He asked to include the inputs given by members during this SAC in the next action plan. He also suggested to conduct the SAC in Village itself with low level officers and field representatives.

All the SAC members gave their valuable suggestions for strengthening TOT activities of ICAR-KVK in the forthcoming year.

At the end Dr. A.Kamaraj, Subject Matter Specialist (Agrl. Engineer) proposed vote of thanks.

Salient suggestions / recommendations of the 7th Scientific Advisory Committee (SAC) Meeting

The following are the recommendations made by the SAC members for follow up action.

1. Trainings on timber tree cultivation techniques should be given in coordination with Department of Forestry.
2. Explore the methods to improve the paddy straw quality in machine harvested paddy fields.
3. Rearing of sheep's in ICAR-KVK farm may be initiated before popularizing in Thiruvarur District.
4. Model mulberry garden may be developed at ICAR-KVK, Needamangalam.
5. Invite NABARD and Lead Bank officials for giving details about their schemes on agriculture and allied sectors during the training programme.
6. Dwarf karpooravalli banana variety may be demonstrated in Thiruvarur District with an input from National Research Centre for Banana (NRCB), Trichy.

7. New technologies, varieties may be popularized by conducting demonstrations, field days and giving wider publicity through print and electronic media.
8. Demonstration of fodder cultivation in Thiruvarur district may be conducted jointly with Department of Animal husbandry.
9. Production of fodder seeds and cuttings may be initiated in ICAR-KVK farm for supplying to the farmers of Thiruvarur district.
10. Utilizing the services of scientists from nearby research stations for conducting trainings, demonstrations, on farm testing and field days.
11. Rearing of Poultry desi birds like Vanaraj and Gramapriya may be demonstrated in Thiruvarur District.
12. Model fish pond may be developed at ICAR-KVK farm by getting fund from National Fisheries Development Board, Hyderabad.
13. New strategies for water saving methods in paddy cultivation may be explored and demonstrated to the farmers of Thiruvarur District.
14. Trainings and demonstration of Roof top garden may be given to urban people of Thiruvarur District.
15. Nutritional chart for important crops may be displayed at ICAR-KVK, Needamangalam.
16. Demonstration of releasing parasitoids for the management of cotton mealy bug.
17. Trainings and Demonstrations on micro irrigations like sprinklers, rain guns may be given in vegetable crops.
18. Trainings on value addition in paddy and pulses may be given to the farmers of Thiruvarur district.