ICAR-ATARI, Pune
DETAILS OF ANNUAL PROGRESS REPORT OF KVKs DURING 2022
(January 2022 to December 2022)

1. GENERAL INFORMATION ABOUT THE KVK

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

Address with PIN code	Telephone		E mail	Website address & No. of visitors (hits)
	Office	FAX		
Senior Scientist and Head Krishi Vigyan Kendra, Junagadh Agricultural University, Keriya Road, Model farm, Amreli (Gujarat)-365601	02792 227122		kvkamreli@gmail.com	www.jau.in No. of visitors: 26610118 (as on dt.11.04.2023)

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

Address	Telephone		E mail	Website address
	Office	FAX		
Junagadh Agricultural University, Agril. Campus, Motibaugh, Junagadh-362001 (Gujarat)	0285 2672080-90	0285 2672004 2672653	-----	www.jau.in

1.3. Name of the Senior Scientist and Head with phone & mobile No.

Name	Telephone / Contact		
	Office	Mobile	Email
Dr. N. S. Joshi Ph.D. (Horticulture)	02792 227122	9428191963	nileshjoshi2207@gmail.com

1.4. Date and Year of sanction: Deputy Secretary, ICAR, New Delhi, Letter No. 13-16/2003/1, Dt. 7.12.2004

1.5. Staff Position (as on 31st December, 2022)

S.N.	Sanctioned post	Name of the incumbent	Mobile No.	Discipline	If Permanent, Please indicate Current Pay Band	Date of joining
1.	Senior Scientist and Head	Dr. N. S. Joshi	942819163	Horticulture	57700-182400 (UL-10)	24/03/2015
2.	Subject Matter Specialist	Dr. P. S. Jayswal	9427569468	Agricultural Engineering		10/09/2012
3.	Subject Matter Specialist	Dr. N. Tiwari	9426047547	Home Science		01/04/2013
4.	Subject	Mr. P. J. Prajapati	8460468032	Crop		31/03/2015

	Matter Specialist			Production		
5.	Subject Matter Specialist	Mr. V. S.Parmar	9724926891	Extension Education		12/05/2016
6.	Subject Matter Specialist	Mr. N. M. Kachhadiya	9824059673	Plant Protection		-
7.	Subject Matter Specialist	Vacant	-	Animal Science	-	-
8.	Programme Assistant	Ms. K. K. Gadhiya	8140730726	Plant pathology	09300-34800	30/07/2018
9.	Computer Programmer	Mr. S .N. Joshi	9426554803	-	39900-126600	01/07/2010
10.	Farm Manager	Mr. S. G. Baria	9586218042	Agriculture	09300-34800	30/07/2018
11.	Accountant/ Superintendent	Mr. H. J. Ravaliya	9429772244	-	39900-126600	01/12/2011
12.	Stenographer	Vacant	-	-	-	-
13.	Driver 1	Out sourcing	-	-	-	-
14.	Driver 2	Out sourcing	-	-	-	-
15.	Supporting staff 1	Out sourcing	-	-	-	-
16.	Supporting staff 2	Vacant	-	-	-	-

1.6. Total land with KVK (in ha): 17.75 ha

S. No.	Item	Area (ha)
1	Under Buildings	3.0
2	Under Demonstration Units	1.0
3	Under Crops	13.0
4	Orchard/ Agro-forestry	0.50
5	Farm Pond	0.25

1.7. Infrastructural Development:

A) Buildings

S. No.	Name of building	Source of funding	Complete		
			Completion Year	Plinth area (Sq. m)	Expenditure (Rs.)
1	Administrative Building	ICAR	2008	500	3190000
2	Farmers Hostel	ICAR		305	2088000
3	Staff Quarters (6)	ICAR		400	3204000
4	Farm Wall	ICAR		-	-
5	RWH system	ICAR		-	960000
6	Threshing floor	ICAR	2009	-	-
7	Godown and processing shed	RKVY		70.62	500000
8	Training hall	RKVY	2010	190.99	1396300
9	Pilot scale Process plant	RKVY		197.31	1536400

10	Implement shed	RKVY		77.33	286300
11	Farm Wall	ICAR	2016	-	497475
12	Goat Shed	ICAR		14.05	69760
13	Vermi-compost unit	ICAR		45	73640
14	Administrative building (Renovation)	ICAR	2017	-	300000
15	Farm Wall	ICAR		-	282554

B) Vehicles

Type of vehicle	Year of purchase	Cost (Rs.)	Total kms Running	Present status
M&M, Bolero XL	2006	4,86,500	34251	Not in good condition
Tractor	2005	3,80,000	---	
Motor Cycle	2010	42,831	23715	Working condition
Power Tiller with implements	2011	1,42,000	---	
Mini Tractor with implements	2014	3,74,820	---	
M&M, Bolero XL	2020	7,81,025	303726	

C) Equipment & AV aids

Name of the equipment / Implements	Year of purchase	Cost (Rs.)	Present status
Digital camera	2008-09	11070	Working condition
Air assisted blast type sprayer	2008-09	98750	Working condition
Vacuum cleaner, RO, water cooler	2008-09	41780	Working condition
Samsung A/C, Nos.-2	2008-09	47300	Working condition
Fax machine	2008-09	17500	Working condition
LCD projector	2008-09	98799	Working condition
Winnowing fan	2008-09	8500	Working condition
Chaff cutter	2008-09	30188	Working condition
Plasma TV, Nos.-2 (21 and 52”)	2008-09	139952	Working condition
Cotton stock shredder-Nos.-3	2008-09	363000	Working condition
Spiral binding machine	2008-09	9090	Working condition
Rotavator with cultivator, Nos.-2	2008-09	180000	Working condition
Inverter	2008-09	19800	Working condition
Manually operated seed dressing drum	2008-09	20930	Working condition
Exhibition display	2008-09	39974	Working condition
Decorticator groundnut machine	2008-09	98850	Working condition
Cotton shredder, Nos.-2	2008-09	242000	Working condition
Battery operated sprayer	2008-09	4940	Working condition
Aspee knapsack sprayer	2008-09	7400	Working condition
Bullock drawn pipe farm seed drill	2008-09	161000	Working condition
Zero till drill	2008-09	66725	Working condition
Bullock drawn clod breaker	2008-09	52000	Working condition
Tractor operated groundnut digger	2008-09	235500	Working condition
Multipurpose thresher (engine operated)	2008-09	114000	Working condition
Mobile seed processing unit	2008-09	1685000	Working condition
Electronic balance	2008-09	19425	Working condition
Power generated	2008-09	49500	Working condition

RO system	2008-09	24450	Working condition
Air condition Nos.-2	2008-09	51580	Working condition
Air condition, Nos.-3	2008-09	89970	Working condition
Photo copier	2008-09	124000	Working condition
LCD and accessories	2008-09	103912	Working condition
Oven and freeze	2008-09	30605	Working condition
Tractor drawn harrow cum cultivator	2008-09	75000	Working condition
Planter	2008-09	44000	Working condition
Rotavator	2008-09	96000	Working condition
Laptop	2008-09	47500	Working condition
Pipe frame blade harrow piece	2008-09	11000	Working condition
Solar equipments	2008-09	81830	Working condition
Gas connection for lab.	2009-10	9700	Working condition
Digital Sony Camera	2009-10	24750	Working condition
Post Whole Digger	2009-10	38000	Working condition
Motor, 1 Hp	2009-10	8650	Working condition
Power Generator	2009-10	45576	Working condition
Multi Crop thresher	2010-11	38000	Working condition
BOD incubator	2010-11	75863	Working condition
Compound light microscope	2010-11	90851	Working condition
Motor 7.5 Hp	2010-11	28600	Working condition
Motor 5 Hp	2010-11	17000	Working condition
Desktop Computer	2010-11	34810	Working condition
Hot air Oven	2010-11	15215	Working condition
Hot plate	2010-11	4725	Working condition
Physical Balance	2010-11	3623	Working condition
Refrigerator	2010-11	19200	Working condition
PH meter	2010-11	3990	Working condition
Conductivity bridge	2010-11	9450	Working condition
Chemical Balance	2010-11	45066	Working condition
Shaker-2 no.	2010-11	49000	Working condition
Flame Photometer	2010-11	44887	Working condition
Spectrophotometer	2010-11	39480	Working condition
Water Distillation Still	2010-11	157500	Working condition
Seed Drill	2010-11	27500	Working condition
Winnower	2010-11	37000	Working condition
Disc Plow	2012-13	30400	Working condition
Disc Harrow	2012-13	37500	Working condition
Nine tine Cultivator	2012-13	19600	Working condition
PC with Accessories (2 No.)	2013-14	65970	Working condition
Printer (2 No.)	2013-14	13898	Working condition
Scanner	2013-14	4309	Working condition
PC with Accessories (2 No.)	2015-16	77590	Working condition
Printer	2015-16	11900	Working condition
Rotavator (NICRA)	2015-16	70000	Working condition

Mobile shredder(NICRA)	2015-16	146000	Working condition
Chaff cutter(NICRA)	2015-16	57000	Working condition
Multi crop thresher(NICRA)	2015-16	155000	Working condition
Rear mounted reaper (NICRA)	2015-16	95000	Working condition
Digital Camera	2016-17	14400	Working condition
Desktop Computer	2016-17	34115	Working condition
Printer	2016-17	12546	Working condition
Automatic seed cum fertilizer drill (NICRA)	2016-17	66412	Working condition
Dibbler (03 nos.)	2016-17	6000	Working condition
Seed dressing drum (5 nos.) (NICRA)	2016-17	15000	Working condition
Rotavator (NICRA)	2016-17	89040	Working condition
Bund former (NICRA)	2016-17	13650	Working condition
Air conditioner (02 nos.)	2016-17	79980	Working condition
Desktop Computer	2016-17	34115	Working condition
Photo copier	2016-17	144391	Working condition
Integrated community computer	2016-17	110644	Working condition
Multi crop thresher	2017-18	187040	Working condition
Computer with UPS	2017-18	42889	Working condition
Computer with UPS (2 Nos.)	2018-19	88400	Working condition
Printer	2018-19	11416	Working condition
UPS (2 Nos.)	2018-19	9000	Working condition
Bolero Jeep	2019-20	781025	Working condition
MB Plough (NICRA)	2019-20	33143	Working condition
Designer table (2 Nos.) (DAMU)	2019-20	32000	Working condition
Almirah (DAMU)	2019-20	13000	Working condition
Revolving chair (2 Nos.) (DAMU)	2019-20	24998	Working condition
Desktop computer (DAMU)	2019-20	42532	Working condition
UPS (2 nos.) (DAMU)	2019-20	3598	Working condition
Printer (DAMU)	2019-20	21110	Working condition
Flamephotometer	2020-21	52255	Working condition
Spectrophotometer	2020-21	285000	Working condition
pH meter	2020-21	24499	Working condition
Keyboard	2021-22	2650	Working condition
Hard disk (2 nos.)	2021-22	8900	Working condition
Smart television	2021-22	149512	Working condition
Galvanized steel sheet (6 nos.)	2021-22	17100	Working condition
DSLR camera	2021-22	66750	Working condition
Outdoor watertank (5000 liter capacity)	2021-22	36000	Working condition
Ceiling fan (5 nos.)	2021-22	9605	Working condition
Mini dal mill (2 nos.) (ARYA)	2021-22	290290	Working condition
Flour mill kit (2 nos.) (ARYA)	2021-22	99396	Working condition
UPS (3 nos.)	2022-23	8700	Working condition
Bag closer machine (1 no.)	2022-23	8495	Working condition
Generator (1 no.)	2022-23	485000	Working condition
Dal mill (3 nos.) (ARYA)	2022-23	272400	Working condition

Iron rods (100 nos.)	2022-23	11000	Working condition
Sprayer pump (16 lit. capacity) (2 nos.)	2022-23	5712	Working condition
Amaron Quanta Battery (1 no.)	2022-23	8100	Working condition

1.8. Details of SAC meeting conducted in the year: SAC meeting was conducted on dt.08/03/2022

S. N.	Name and Designation of Participants	Salient Recommendations	Action taken
1.	Dr. H. M. Gajipara, Director of Extension Education, JAU, Junagadh	To use revolving fund for expenditure for GI tag of 'Babarkot no Bajaro'	Suggestion accepted and GI tag for 'Babarkot no Bajaro' is under process
		To provide soil and water test free of cost for progressive farmers and farm women	Suggestion accepted and total 287 soil and water sample tested in this year
		To study the impact of FLDs	Suggestion accepted and project wise impact evaluation of FLD presented by associated PI.
		To promote natural farming and maintain data base of organic farmers in the district	Suggestion accepted and total 22 no. of trainings programme were organized for total 2389 no. of participants under Natural Farming and prepared farmers data base of organic farmers in the district
		To increase number of trainings in horticulture discipline	Suggestion accepted and 06 trainings programme were organized for 180 no. of participants
		To extend plant protection OFT one more year	Suggestion accepted and plant protection OFT was extend for one more year
		To prepare Parthenium based compost during celebration of Parthenium week	One day training programme was organized for 35 farmers to prepare Parthenium based compost during celebration of Parthenium week
2.	Dr. D. S. Hirpara, Associate Director of Res. & Res. Sci. (Dry Farming) Main Dry Farm. Res. Stat., JAU, Targhadia	Plantation of environment friendly tree and medicinal plant at village level	Suggestion accepted and 100 environment friendly tree and 150 medicinal plant like amla, tulsi, neem, moringa etc. were distributed at village level
3.	Dr. K. P. Sojitra, I/C Deputy Director of Horticulture, Amreli	To add bio fertilizer in Agronomy OFT of Nano urea	Suggestion removed by committee during Annual Action Plan meeting at AAU and further committee suggested to take OFT on onion of Banana Pseudo Liquid & 19-19-19
4.	Dr. A. S. Dudhat, COA, JAU, Mota Bhandariya	To take of FLDs for Soybean crop	Suggestion accepted and 10 FLDs on soybean were given to farmers on variety Guj. Jnd Soybean-3

2. DETAILS OF DISTRICT / JURISDICTION AREA OF KVK

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

S. No	Farming system/enterprise
1	Dry Farming
2	Rainfed : Cotton, Groundnut, Sesame, Black gram, Green gram, Mango, Onion
3	Agriculture – Horticulture (Mango)
4	Agriculture – Dairy
5	Agriculture – Fisheries
6	Cotton based cropping system
7	Groundnut based cropping system
8	Sesame based cropping system
9	Enterprise: Poultry, Fishery, Dairy, Sericulture, Vermi compost

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

Agro-climatic Zone (Planning Commission)	Characteristics
Gujarat Plains and Hills Region (XIII)	• The region encompasses the plains and hills of Kathiawar and the fertile valleys of Mahi and Sabarmati rivers • This is an arid & semi-arid region where average annual rainfall varies from 50-100cm, and temperature ranges from 15-42^0 C • Soils are regur in plateau region, alluvial in coastal plains • Groundnut, cotton, rice, millets, oilseeds, wheat and tobacco are the main crops • Wheat is the main rabi crop in irrigated areas of the region • The whole region is famous for production of oilseeds • Development strategies for the region include surface and ground water management, rain water harvesting dry land farming, agro-forestry and development of fisheries in coastal zones and deltas • The climate of the Amreli district varies from moderately hot throughout the year except in winter. The climate is humid along with the coastal belt. The temperature varied from 13.3° C in January to 42.0° C in April. The total rainfall of year 2022 is 620 mm.

b) Topography

S. No.	Agro ecological situation	Characteristics
1	Medium black soil with 400-700 mm rainfall	-
2	Shallow black soils with 600-700 mm rainfall	-
3	Saline - alkali (Heavy texture) soils with 500-600 mm rainfall	Saline groundwater
4	Hilly soils with 300-600 mm rainfall	Well drained soils
5	Coastal alluvial soil with medium rainfall 750-1000 mm	Saline groundwater

2.3 Soil Types

S. No	Soil type	Characteristics
1	Medium black	Major portion of the district is covered by the medium black soil, which is considered very productive. It is rich in lime, magnesia and alumina but poor in phosphorus, nitrogen and organic matters. It can retain considerable moisture and is much suitable for agriculture.

2	Coastal alluvial	The coastal alluvial soil is found on the coastal areas of Jafrabad and Rajula. Among the whole of the coastal areas, the land is sandy. However, the soils in Rajula and Jafrabad are less productive as they are saline. The soils in the northern part of the district including Babra and parts of Kunkavav Vadia and Dhari talukas are shallow and rocky. Certain areas in Amreli taluka known as Kharapat are poor in cultivation; but this taluka possesses the best land along the north and the south banks of the Shetrunji.
3	Rocky soils	The soil of Dhari taluka is lighter and near the Gir forest redder. The soil on the southern part of the district is light in colour with only few fertile gradients, and in many places, it is rocky and barren.
4	Alkaline soils	Alkaline soils are found in parts of Lathi, Lilia and Amreli talukas and are productive and non-productive.

2.4. Area, Production and Productivity of major crops cultivated in the area of jurisdiction of KVK (2022)

S. No	Crop	Area (ha)	Production (000 T)	Productivity (Kg/ha)
Major Field crops				
1	Green gram	71.25	65.89	924.74
2	Tur (Red Gram)	19.49	26.66	1368.00
3	Wheat	318.60	1182.13	3710.39
4	Gram	802.07	1607.81	2004.58
5	Groundnut	1866.32	3140.06	1682.49
6	Sesame	246.98	120.86	489.37
7	Castor	6.66	13.72	2060.26
8	Irrigated Cotton (Lint)	2157.53	5964.81	469.99
9	Unirrigated Cotton(Lint)	1155.82	2149.77	316.19
10	Cumin	53.19	23.95	450.20
11	Onion	116.46	4074.11	34982.95
12	Garlic	23.53	188.74	8021.23
13	Bajra	52.93	109.77	1894.85
14	Udad	16.73	12.34	737.40
15	Math	0.16	0.08	521.46
16	Soybean	6.59	8.95	1357.46
17	Sugarcane	0.42	29.82	71000.00
Major Horticultural crops				
1	Mango	6804	55521	8160
2	Sapota	376	2940	7820
3	Citrus	690	7638	1107
4	Ber	109	822	7540
5	Banana	110	4319	3926
6	Guavava	275	2236	8130
7	Pomegranate	104	499	4800
8	Date palm	14	2	160
9	Papaya	80	3040	3800
10	Custard Apple	47	400	8510
11	Aonla	20	207	1036
12	Coconut	107	868	8110
13	Onion	15700	400350	2550
14	Brinjal	2334	42012	1800
15	Cabbage	903	18241	2020
16	Okra	1625	14625	9000

17	Tomato	2016	46368	2300
18	Cauliflower	459	6197	1350
19	Cluster bean	1307	10456	8000
20	Cow Pea	845	13385	15840
21	Cucurbits	2409	21268	8830
22	Cumin	3800	2736	720
23	Chilli-Dry	376	846	2250
24	Garlic	5900	42716	7240
25	Coriander	7400	10952	1480
26	Ginger	04	70	17500
27	Turmeric	29	493	17000
28	Fenugreek	29	48	1670
29	Ajwain	190	171	900
30	Rose	23	163	7070
31	Marigold	08	58	7200

Source: 1- District-wise Area, Production and Yield of Important Food & Non-food Crops in Gujarat State Year: 2020- 21

2.5. Weather data (2022)

Month	Normal RF (mm)	Rainy days (number)	Temperature (^{0} C)		Relative Humidity (%)	
			Maximum	Minimum	Maximum	Minimum
January 2022	1	0	27.1	13.3	83.2	34.3
February 2022	0	0	31.6	15.5	88.7	23.7
March 2022	0	0	38.6	21.5	61.6	13.3
April 2022	0	0	42.0	24.7	79.3	11.4
May 2022	0	0	40.9	27.0	89.5	22.5
June 2022	32	1	37.9	26.8	93.3	40.6
July 2022	263.5	16	31.4	25.6	99.9	75.3
August 2022	101	8	31.7	25.2	100.0	72.9
September 2022	215	9	33.0	24.3	100.0	64.3
October 2022	7.5	1	34.7	22.2	91.1	39.1
November 2022	0	0	32.9	17.8	80.8	29.2
December 2022	0	0	30.1	16.3	69.5	33.3
Total	**620**	**35**	34.3	21.7	86.4	38.5

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

Livestock	Milk Production in percent	State share (in %)
Crossbred cows	10.00	Rank 21(0.24 %)
Indigenous cow	167.59	Rank 08 (5.18%)
Buffalo	188.20	Rank 19 (2.51%)
Goats	11.38	Rank 10 (3.43 %)
Total	**377.7**	**1031 Tonnes/day Rank 18 (2.47 %)**

Source: 37th issue on estimates of major livestock products for the year 2019-20, Gujarat state.

2.7. Details of Operational area / Villages

Taluka / Block	Name of the village	Major crops & enterprises	Major problem identified	Identified Thrust Areas
Liliya	Hathigadh	Groundnut, Cotton, Sesamum,	Heavy infestation of sucking pest in cotton, Sesame leaf blight,	• IPM and INM in major crops of this area.
Amreli	Jasvantgadh			
Amreli	Randhiya			

Khambha	Ingorala	Wheat, Cumin, Chickpea, Garlic, Onion, Mango, lemon Enterprises are dairy business, vermi composting	Stem rot disease in Groundnut, Mango Malformation, Less area under Horticultural crops	• Motivate the farmers for arid Horticultural crops. • To create the awareness for grading. • Processing and marketing (value addition)
Kukavav	Devgam			
Amreli	Rikadiya			
Babra	Kuvargadh			
Savakundla	Ramgadh			
Savakundla	Dhajadi			
Babra	Jambarvada			
Kukavav	Khadkhad			
Bagasra	Rafala			
Babara	Sukhpar			
Dhari	Fachariya			
Lathi	Sekhpipariya			

2.8. Priority thrust areas:

Sr. No.	Crop/ Enterprise	Thrust area
1.	Cotton, Groundnut, Castor, Cumin, Wheat, vegetables, fruits, etc.	Integrated Crop Management in major crops
2.	Farm waste	Recycling of farm waste through composting, vermin compost, green manuring, etc.
3.	Micro irrigation	Efficient use of water by micro irrigation system, water harvesting structure, and water conservation techniques
4.	Soil	Reclamation of saline & alkaline soils
5.	Farm Women	Farm women empowerment by training in value addition, handicrafts, and small scale enterprises
6.	Horticulture	Promotion of arid horticulture fruit crops
7.	Improved Implements	Popularization of the mechanized technological know how

3. TECHNICAL ACHIEVEMENTS

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

OFT				FLD			
1				2			
Number of OFTs		Number of farmers		Number of FLDs		Number of farmers	
Targets	Achievement	Targets	Achievement	Targets	Achievement	Targets	Achievement
06	06	27	27	22	22	491	491

Trainings					Extension Activities			
3					4			
No. of courses			No. of participants		No. of activities		No.of participants	
Clientele	Targets	Achieve-ment	Targets	Achieve-ment	Targets	Achieve-ment	Targets	Achieve-ment
Farmers	64	92	2515	4588	1358	1544	8814	18730
Rural youth	03	09	356	498				
Ext. Funct.	02	02	76	94				
Sponsored & Collab.	15	16	610	883				
Vocatio-nal	01	01	45	65				
Other Scheme Trainings (ATIC, NICRA, NFSM, NMOOP, Natural Farming)	ATIC-**12** NMOOP **-02** NFSM-**06** Natural Farming –**05** ARYA-**06** DAMU-**00** IRM-**01**	ATIC-**15** NMOOP **-02** NFSM-**11** Natural Farming –**05** ARYA-**10** DAMU-**04** IRM-**01**	ATIC-**525** NMOOP **-95** NFSM-**241** Natural Farming –**175** ARYA-**315** DAMU-**00** IRM-**65**	ATIC-**675** NMOOP **- 150** NFSM-**352** Natural Farming –**266** ARYA-**757** DAMU-**146** IRM-**85**	ATIC - **15** NMOOP **-06** NFSM-**15** Natural Farming –**04** ARYA-**07** DAMU-**00** IRM-**02**	ATIC - **21** NMOOP **-08** NFSM-**25** Natural Farming –**04** ARYA-**12** DAMU-**05** IRM-**02**	ATIC - **205** NMOOP **-135** NFSM-**110** Natural Farming –**20** ARYA-**43** DAMU-**00** IRM-**20**	ATIC - **285** NMOOP **-158** NFSM-**259** Natural Farming –**25** ARYA-**92** DAMU-**175** IRM-**25**

Seed Production (kg)			Planting materials (Nos.)	
5			6	
Crop	Target	Achievement	Target	Achievement
Wheat	3500	5960	---	----
Chickpea	1200	1580		
Groundnut	2400	2530		
Groundnut	2800	1980		
Groundnut	2400	4170		
Sesame	200	705		
Total	**12500**	**16925**		

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

3.1. B. Operational areas details during 2022

Sr. No.	Major crops & enterprises being practiced in cluster villages	Prioritized problems in these crops/ enterprise	Extent of area (ha/No.) affected by the problem in the district	Names of Cluster Villages identified for intervention	Intervention (OFT, FLD, Training, extension activity etc.)*
1.	Groundnut, Cotton, Sesamum, Wheat, Cumin, Chickpea, Garlic, Onion, Mango, lemon Enterprises are dairy business, vermi composting,	Heavy infestation of sucking pest in cotton, Sesame leaf blight, Stem rot disease in Groundnut, Mango Malformation, Less area under Horticultural crops	Every village of this district is facing problem.	Hathigadh	• IPM and INM in major crops of this area, • Motivate the farmers for arid Horticultural crops. • To create the awareness for grading, processing and marketing (value addition) • Various OFT, FLD, trainings, extension activities were carried out.
2.				Jasvantgadh	
3.				Randhiya	
4.				Ingorala	
5.				Devgam	
6.				Rikadiya	
7.				Kuvargadh	
8.				Ramgadh	
9.				Dhajadi	
10.				Jambarvada	
11.				Khadkhad	
12.				Rafala	
13.				Sukhpar	
14.				Fachariya	
15.				Sekhpipariya	

3.2. Technology Assessment (Kharif 2022, Rabi 2021-22, Summer 2022)

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 Pest Management		2								2
Integrated Crop Management				1						1
Resource Conservation Technology						1				1
Storage Technique			2							2
Total	0	**2**	**2**	**1**	**0**	**1**	**0**	**0**	**0**	**6**

A2. Abstract on the number of technologies assessed in respect of livestock enterprises-NIL

B. Achievements on technologies Assessed

B.1. Technologies Assessed under various Crops

Thematic areas	Crop	Name of the technology assessed	No. of trials	No. of farmers	Area in ha (Per trial covering all the Technological Options)
Integrated Pest Management	Groundnut	Management of white grub in Groundnut	3	3	0.6
	Sesame	Management of leaf Webber in Sesame	3	3	0.6

Integrated Crop Management	Cotton	High Density Planting in Cotton	3	3	0.4
Resource Conservation Technology	Watermelon	Effect of plastic mulch on yield of watermelon	3	3	0.6
Storage Technique	Groundnut seeds	Effect of Packaging material on seed quality of groundnut seeds.	05	05	-
	Pigeonpea, Green gram	Preservation techniques of different pulses with organic methods	10	10	-
Total			**27**	**27**	**2.2**

B.2. Technologies assessed under Livestock & fishery assessment: NIL

B.3 Technologies assessed under other enterprises: NIL

B 4.Technologies assessed under Women empowerment assessment: NIL

C.1. Results of Technologies Assessed

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
1	2	3	4	5	6	7	8	9	10
Cotton	Rainfed	Farmers do not adopt closer planting, there for get low cotton yield due to less soil moisture and incidence of pest and disease.	High Density Planting in Cotton	3	Farmers' practices:120 X 45-60 cm (18519-13888 plants/ha)	Yield (q/ha)	18.52	As compare to treatments T1 and T2 production of cotton higher in treatment T3	High density with de-topping gave better yield
					Recommended Practice : 90 X 30 cm (37037 plants/ha) (Var. GTHH-49 (bt))	Yield (q/ha)	24.80		
					Intervention: T2 + De-topping at 75 DAS (Var. GTHH-49 (bt))	Yield (q/ha)	27.50		
Sesame	Rainfed	Injudicious use of pesticides	Management of leaf Webber in Sesame	3	T1: Farmers' practices: High dose and Use of conventional Chemical pesticides (Farmers Practices- Monocrotophos 50 ml, fenvalrate 20 to 25 ml and cypermathrin 20 to 25 ml/ 15 lit. of water)	Yield (q/ha)	5.4	As compare to T1 treatment production of higher in treatment T2 (But 60-70% reduction in production due to heavy Rainfall)	Increase in production in treatment T2 because of judicious use of recommended dose of pesticides compare to treatment T1 (But 80-90% reduction
						No. of Larva per Plant /1mt. row length before spray	2.30		
						No. of Larva per Plant /1mt. row length after spray	1.32		
					T2: Spray of *Beuveria bassiana* 75gm /10 lit + emamectin benzoate 5 SG 0.0035% (4g/10	Yield (q/ha)	6.7		
						No. of Larva per Plant /1mt. row length before spray	2.40		

					lit. water) and 2nd spray at 15 days after 1st spray)	No. of Larva per Plant /1mt. row length after spray	0.85		in production due to heavy Rainfall)
Groundnut	Rainfed	No seed treatment & Soil application of bio pesticides	Management of white grub in Groundnut	3	T1: Farmers' practices: No Seed treatment and application of chlorpyriphos 4 lit/ha with irrigation water	Yield (q/ha)	28.8	As compare to T1 treatment production higher in treatment T2	-
						No. of Larva per Plant /1mt. row length before spray	2.60		
						No. of Larva per Plant /1mt. row length after spray	0.75		
					T2 : Seed treatment with Chlorpyrifos 20 EC @ 25 ml/kg seed and Soil application of Metarhiziumanisopliae 1.15 WP @ 5 kg/ha along with Castor cake (300 kg/ha) before sowing and drenching in plant row after 30 days of germination	Yield (q/ha)	32.9		
						No. of Larva per Plant /1mt. row length before spray	---		
						No. of Larva per Plant /1mt. row length after spray	0.22		
Water-melon	Irrigated	Low yield potential of watermelon	Effect of plastic mulch on yield of watermelon	3	T1 (Farmers' practices): No mulch	Yield (q/ha)	232.2	Treatment T2 was found better than T1 and T3.	Plastic mulch treatment was found beneficial for insect reduction and fruit disease reduction
						Per fruit weight	3.47		
					T2 (Recommended Practice): Silver Black Plastic Mulch (20 micron) under drip irrigation system	Yield (q/ha)	369.6		
						Per fruit weight	5.24		
					T3 (Technology	Yield (q/ha)	288.8		

					assessed or Refined): Wheat straw mulch	Per fruit weight		4.32		
Groundnut	-	Farmers do not store groundnut seed properly	Effect of packaging material on seed quality of groundnut	5	T1- Loose heap storage	Insect infestation		52.5	Treatment T2 was found better than T1.	Use of PICS bag is very much useful for seed storage
					T2- Use of Purdue Improved Crop Storage (PICS) bags for storage	Insect infestation		2.5		
Farm woman	-	Lack of knowledge	Preservation techniques of different pulses with organic methods	3	T1. Use of Neem leaves	Pigeon pea	Infestation percent	10.5	T2 was found more suitable for storage of grains	-
						Green gram		8.9		
					T2. Use of Castor oil	Pigeon pea	Infestation percent	2.0		
						Green gram		1.85		
					T3. Use of plastic bag	Pigeon pea	Infestation percent	9.1		
						Green gram		7.2		
					T4.Without any treatment	Pigeon pea	Infestation percent	21.5		
						Green gram		26.5		

Contd..

Technology Assessed	Source of Technology	Production	Unit	Net Return	B:C Ratio
13	14	15	16	17	18
Farmers' practices:120 X 45-60 cm (18519-13888 plants/ha)	Cotton Research Station, JAU, Junagadh	18.52	q/ha	56396	2.74
Recommended Practice : 90 X 30 cm (37037 plants/ha) (Var. GTHH-49 (bt))		24.80	q/ha	84240	3.42
Intervention: T2 + De-topping at 75 DAS (Var. GTHH-49 (bt))		27.50	q/ha	98850	3.75

T1: Farmers' practices: High dose and Use of conventional Chemical pesticides (Farmers Practices- Monocrotophos 50 ml, fenvalrate 20 to 25 ml and cypermathrin 20 to 25 ml/ 15 lit. of water)	ARS, Amreli	5.4	q/ha	55848.7	4.54
T2: Spray of *Beuveria bassiana* 75gm /10 lit + emamectin benzoate 5 SG 0.0035% (4g/10 lit. water) and 2nd spray at 15 days after 1st spray)		6.7	q/ha	72939.3	5.87
T1: Farmers' practices: No Seed treatment and application of chlorpyriphos 4 lit/ha with irrigation water)	Dept. of Entomology, COA, JAU, Junagadh	28.8	q/ha	130051.7	4.52
T2: Seed treatment with Chlorpyrifos 20 EC @ 25 ml/kg seed and Soil application of Metarhiziumanisopliae 1.15 WP @ 5 kg/ha along with Castor cake (300 kg/ha) before sowing and drenching in plant row after 30 days of germination		32.9	q/ha	155899.3	5.46
T1: Farmers' practices: No mulch	Dept. of Renewable Energy and Rural Engg., CAET, JAU, Junagadh	232.2	q/ha	40742.3	1.64
T2: Recommended Practice: Silver Black Plastic Mulch (20 micron) under drip irrigation system		369.3	q/ha	124890.9	2.81
T3: Technology assessed or Refined: Wheat straw mulch		288.8	q/ha	53540	1.98
T1: Loose heap storage	JAU Recommendation	52.2	%	-	-
T2: Use of Purdue Improved Crop Storage (PICS) bags for storage		2.5	%	-	-
T1: Use of Neem leaves	IRRI-2011	-	-	-	-
T2: Use of Castor oil					
T3: Use of plastic bag					
T4:Without any treatment					

C. 2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details:

OFT -1: Agronomy (Ongoing)

1) Title of technology: High Density Planting in Cotton

2) Problem Diagnosed/Defined: Farmers do not adopt closer planting, there for get low cotton yield due to less soil moisture and incidence of pest and disease.

3) Detail of technologies selected for assessment/refinement

(1) Crop : Cotton

(2) Season/Year : Kharif 2017-18 to Kharif 2019-20

T1: (Farmers' practices)	120 X 45-60 cm (18519-13888 plants/ha)
T2 : (Recommended Practice)	90 X 30 cm (37037 plants/ha) (Var. G. cot-8 (bt)
T3: (Intervention)	T2 + De-topping at 75 DAS (Var. GTHH-49 (bt)

(4) Source of technology : Cotton Research Station, JAU, Junagadh

(5) Production system thematic area : Rainfed Farming

(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 and developmental departments

OFT-2: Plant Protection (Ongoing)

1. Title of Technology Assessed: Management of leaf Webber in Sesame

2. Problem Definition: Injudicious use of pesticides

3. Details of technologies selected for assessment

Crop : Sesame

Season/ Year : Kharif -2019-20 to Kharif –2021-22

Spacing : 120 x 45 cm

T1	Farmer practices	Farmers' practices: High dose and Use of conventional Chemical pesticides (Farmers Practices- Monocrotophos 50 ml, fenvalrate 20 to 25 ml and cypermathrin 20 to 25 ml/ 15 lit. of water)
T2	Assessment/ refined Practices	Spray of Beuveriabassiana 75gm /10 lit + emamectin benzoate 5 SG 0.0035% (4g/10 lit. water) and 2nd spray at 15 days after 1st spray)

4. Source of technology: ARS, Amreli

5. Production system and thematic area: Rainfed Farming

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 farmers shouldSpray of Beuveriabassiana 75gm /10 lit + emamectin benzoate 5 SG 0.0035% (4g/10 lit. water) and 2nd spray at 15 days after 1st spray)

9. Constraints identified and feedback for research

10. Process of farmers participation and their reaction

OFT -3: Plant Protection

1. Title of Technology Assessed: Management of white grub in Groundnut

2. Problem Definition: No seed treatment & Soil application of bio pesticides

3. Details of technologies selected for assessment/refinement:

(1) Crop: Groundnut

(2) Season/ Year: Kharif -2019-20 to Kharif –2021-22

(3) Spacing: 45 x 10

T_1	Farmer practices	Farmers' practices: No Seed treatment and application of chlorpyriphos 4 lit/ha with irrigation water)
T_2	Assessment/refined Practices	Seed treatment with Chlorpyrifos 20 EC @ 25 ml/kg seed and Soil application of Metarhiziumanisopliae 1.15 WP @ 5 kg/ha along with Castor cake (300 kg/ha) before sowing and drenching in plant row after 30 days of germination

4. Source of technology: Dept. of Entomology, COA, JAU, Junagadh
5. Production system and thematic area: Rainfed Farming
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: Farmers should seed treatment with Chlorpyrifos 20 EC @ 25 ml/kg seed and Soil application of Metarhiziumanisopliae 1.15 WP @ 5 kg/ha along with Castor cake (300 kg/ha) before sowing and drenching in plant row after 30 days of germination
9. Constraints identified and feedback for research:-
10. Process of farmers participation and their reaction:-

OFT -4: Agriculture Engineering (Completed)

1. Title of Technology Assessed: Effect of plastic mulch on yield of watermelon

2. Problem Definition: Low yield potential of watermelon.
3. Details of technologies selected for assessment/refinement:
   (i) Crop: Watermelon
   (ii) Season/ Year: Kharif -2019-20 to Kharif –2021-22
   (iii) Spacing: 40 * 40 cm

T1	Farmer practices	No mulch
T2	Recommended Technology	Silver Black Plastic Mulch (20 micron) under drip irrigation system
T3	Assessment/ refined Practices	Wheat straw mulch

4. Source of technology: Dept. of Renewable Energy and Rural Engg., CAET, JAU, Junagadh
5. Production system and thematic area: Irrigated Farming
6. Performance of the Technology with performance indicators: Yield, Per fruit weight, C:B ratio
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: Plastic mulch was found beneficial for watermelon.

OFT -5: Agriculture Engineering (Ongoing)

1. Title of Technology Assessed: Effect of packaging material on seed quality of groundnut

2. Problem Definition: Low yield potential of watermelon.
3. Details of technologies selected for assessment/refinement:
   (i) Crop: Groundnut
   (ii) Season/ Year: 2021-22 to 2023-24
   (iii) Spacing: -

T1	Farmer practices	No mulch
T2	Recommended Technology	Silver Black Plastic Mulch (20 micron) under drip irrigation system
T3	Assessment/ refined Practices	Wheat straw mulch

4. Source of technology: JAU Recommendation and interaction with scientists
5. Production system and thematic area: -
6. Performance of the Technology with performance indicators: Insect Infestation, C:B ratio

7. Feedback, matrix scoring of various technology parameters done through farmer's participation / other scoring techniques: Feedback
8. Final recommendation for micro level situation: -
9. Constraints identified and feedback for research:-
10. Process of farmers participation and their reaction: -

OFT -6: Home Science (Ongoing)

1. Title of Technology Assessed: Preservation techniques of different pulses with organic methods
2. Problem Definition: Lack of knowledge
3. Details of technologies selected for assessment refinement:
   (i) Crop: Pigeon pea and green gram
   (ii) Season/ Year: Kharif -2021 to Kharif –23
   (iii) Spacing: -

1	Farmer practices	T4.Without any treatment
2	Recommended Technology	T3. Use of plastic bag
3	Assessment/ refined Practices	T2. Use of Castor oil
4		T1. Use of Neem leaves

4. Source of technology: IRRI-2011
5. Production system and thematic area: Storage Techniques
6. Performance of the Technology with performance indicators: Infestation percent
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: T2 was found more suitable for storage of grains

3.3. FRONTLINE DEMONSTRATION

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

List of technologies demonstrated during previous year and popularized during 2022 and recommended for large scale adoption in the district

SN	Crop/ Enterprise	Thematic Area	Technology demonstrated	Details of popularization methods suggested to the Extension system	Horizontal spread of technology		
					No. of villages	No. of farmers	Area in ha
1	Castor	Varietal Evaluation	GCH-9	Trainings, demonstration, field days	4	10	4
2	Cotton	Nutrient	INM		7	10	4
3	Wheat		INM		4	10	4
4	Cumin	Disease Mgmt	IDM		6	10	4
5	Coriander	Varietal Evaluation	GC-2		4	10	4
6	Sesame		GT-3		4	10	4
7	Black Gram		Guj. Urd.-2		6	10	4
8	Green Gram		GM-6		5	10	4

B. Details of FLDs implemented during 2022 **(Kharif 2022, Rabi 2021-22, Summer 2022)** (Information is to be furnished in the following **three tables** for **each category** i.e. **cereals, horticultural crops, oilseeds, pulses, cotton and commercial crops**.)

SN	Crop	Thematic area	Technology Demonstrated	Season and year	Area (ha)		No. of farmers/ demonstration			Reasons for shortfall in achievement
					Proposed	Actual	SC/ST	Others	Total	
1	Sesame	Varietal Evaluation	GT-3	Summer 2022	4	4	2	8	10	-
2	Black Gram		Guj. Urd-2		4	4	2	8	10	-
3	Green Gram		GAM-5		4	4	2	8	10	-
4	Watermelon	Resource mgmt	Plastic mulch		4	4	2	8	10	-
5	Castor	Varietal Evaluation	GCH-9	Kharif-22	4	4	2	8	10	-
6	Cotton		G. Cot. 24 (BT)		4	4	2	8	10	-
7	Soybean		GJS-3		4	4	2	8	10	-
8	Coriander		Guj. Coriander 3	Rabi 21-22	4	4	2	8	10	

Details of farming situation

Crop	Season	Farming situation	Soil type	Status of soil			Previous crop	Sowing date	Harvest date	Seasonal rainfall (mm)	No. of rainy days
				N	P	K					
Sesame	Summer 2022	Irrigated	Medium Black	L	H	H	Chickpea	2nd to 4th week of Feb.-2022	3rd to 4th week of April 2022	**620**	**35**
Black Gram				L	L	H	Wheat	2nd to 3rd week of Feb.-2022	2nd to 3rd week of April 2022		
Green Gram				L	M	H	Wheat				
Watermelon				M	M	H	Cotton	2nd to 3rd week of February-2022	1st to 2nd week of June 2022		
Castor	Kharif-22	Rainfed		L	M	H	-	4th week of July to 2nd week of August-2022	1st week of March to 2nd week of March-2023		
Cotton				M	M	H	Cotton	3rd week of June to 1st week of July-2022	1th week to 3rd week of January -2023		
Soybean				L	M	H	Cotton	2nd week of June to 1st week of July-2022	1th week to 2nd week of Nov. -2023		
Coriander	Rabi 21-22	Irrigated		M	L	H	Groundnut	2nd to 3rd Week of November 2022	3rdto 4thWeek of February 2023		

Extension and Training activities under FLD

SN	Activity	No. of activities organized	Number of participants	Remarks
1	Field days	10	50	-
2	Farmers Training	4	187	-
3	Media coverage	3	-	-
4	Training for extension functionaries	-	-	-

C. Performance of Frontline demonstrations

Frontline demonstrations on oilseed crops

Crop	Thematic Area	technology demonstrated	Variety	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										
Sesamum	Variety introduction	Variety	GT-3	10	4	12.2	8.9	10.21	8.22	24.4	21,878.4	86,785.0	64,906.6	3.98	20,675.0	60,006.0	39,331.0	2.93
Soybean	Variety introduction	Variety	GJS-3	10	4	22.25	17.28	18.98	15.98	18.94	24682	100610	75928	4.09	26400	83112	56712	3.15

Frontline demonstration on pulse crops

Crop	Thematic Area	technology demonstrated	Variety	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										
Blackgram	Variety introduction	Variety	Guj. Urd-2	10	4	11.8	5.6	9.74	8.71	16.9	19,023.0	32,128.8	13,105.8	1.70	18,733.0	26,304.2	7,571.2	1.40
Greengram	Variety introduction	Variety	GAM-5	10	4	13.5	8.2	11.26	8.77	28.6	20,698.4	73,190.0	52,491.6	3.55	21,115.0	52,620.0	31,505.0	2.54

Frontline demonstration on other crops

Category & Crop	Thematic Area	Name of the tech.	No. of Farmers	Area (ha)	Yield (q/ha)				% Change in Yield	Other Parameters		Economics of demonstration (Rs./ha)				Economics of check (Rs./ha)			
					Demo			Check		Demo	Check	Gross Cost	Gross Return	Net Return	BCR (R/C)	Gross Cost	Gross Return	Net Return	BCR (R/C)
					High	Low	Average												
Vegetables																			
Coriender seed	Variety introduction	Variety	10	4	-	-	15.265	13.235	15.34	-	-	22378.4	100433.75	78055.35	4.48	21548	78086.5	56538.5	3.62
Fruit crops																			
Watermelon	Resource mgmt	Plastic mulch	10	4	327	325	326.5	235.7	38.52	-	-	76350.3	145555.7	24694.2	1.90	54450.8	72145.3	69205.6	1.32

Commercial Crops																		
Cotton	Variety introduction	G. Cot. 24 (BT)	10	4	22.8	14.6	19.31	16.43	20.57	-	-	31682	164093	132411	5.18	33400	123225	89825	3.69

FLD on Farm Implements and Machinery

Name of the implement	Crop	Technology demonstrated	No. of Farmer	Area (ha)	Major parameters	Filed observation (output/ man hour)		% change in major parameter	Labor reduction (man days)				Cost reduction (Rs./ha or Rs./Unit etc.)			
						Demo	Check		Land prepara-tion	Sowing	Weedin g	Total	Land prepara-tion	Labo-ur	Irriga-tion	Total
Cotton shredder	Cotton	Waste management	5	15	-	-	-	-	-	-	-	-	-	-	-	-
Milking Stool	-	Milking stool use	5	-	-	-	-	-	-	-	-	-	-	-	-	-

FLD on Other Enterprise: Kitchen Gardening

Nutrition garden components	Thematic area	Area (sq mt)	No. of Farmer	No. of Units (gm)	Yield (Kg)- supply of vegetables, fruits, etc from KG in the year		% change in yield	Economics of demonstration (Rs./ha)			
					Demo	Check*		Gross Cost	Gross Return/Savings	Net Return	BCR (R/C)
Okra	Nutrition garden	200 sq	100	25.0	22.0	-	-	-	1860	-	-
Cluster bean				15.0	10.0	-	-	-	800	-	-
Cow Pea				30.0	30.0	-	-	-	1650	-	-
Brinjal				7.00	70.0	-	-	-	1400	-	-
Tomato				7.00	40.0	-	-	-	1400	-	-
Bottle guard				10.0	12.0	-	-	-	240	-	-
Sponge Guard				10.0	21.0	-	-	-	840	-	-
Cucumber				7.0	42.0	-	-	-	1680	-	-
Ridge Guard				10.0	20.0	-	-	-	800	-	-
								Total	**10670**		

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						
Castor	Variety	GCH-9	10	4	33.5	26.4	29.2	25.66	13.80	31309	142810.74	111501.74	4.5

3.4. 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
I Crop Production										
Organic farming/Natural Farming	03	72	62	134	00	00	00	72	62	134
Balance use of fertilizers	01	30	00	30	00	00	00	30	00	30
Use and importance of Bio fertilizer	01	35	12	47	00	00	00	35	12	47
PrakrutikKheti	01	78	0	78	00	00	00	78	0	78
Scientific Cultivation of Kharif crops	01	55	0	55	00	00	00	55	0	55
Total	**07**	**270**	**74**	**344**	**00**	**00**	**00**	**270**	**74**	**344**
II Horticulture										
a) Vegetable Crops										
Nursery raising	01	25	10	35	04	05	09	29	15	44
Total (a)	**01**	**25**	**10**	**35**	**04**	**05**	**09**	**29**	**15**	**44**
b) Fruits										
Production technology of fruit	01	31	00	31	04	00	04	35	00	35
Total (b)	**01**	**31**	**00**	**31**	**04**	**00**	**04**	**35**	**00**	**35**
f) Spices										
Production technology of spices crops	01	39	10	49	09	03	12	48	13	61
Total (f)	**01**	**39**	**10**	**49**	**09**	**03**	**12**	**48**	**13**	**61**
Grand Total (a to f)	**03**	**95**	**20**	**115**	**17**	**8**	**25**	**112**	**28**	**140**
III Soil Health and Fertility Management										
Integrated Nutrient Management	01	31	00	31	00	00	00	31	00	31
Soil and Water Testing	01	40	00	40	00	00	00	40	00	40
Total	**2**	**71**	**00**	**71**	**00**	**00**	**00**	**71**	**00**	**71**
V Home Science/Women empowerment										
Household food security by kitchen gardening and nutrition gardening	02	54	43	97	00	04	04	54	47	101
Design and development of low/minimum cost diet	01	00	20	00	00	08	08	00	28	28

Value addition	01	00	66	66	00	24	24	00	90	90
Location specific drudgery reduction technologies	01	00	53	53	00	00	00	00	53	53
Rural Crafts	01	00	26	26	00	04	04	00	30	30
Women and child care	01	00	30	30	00	06	06	00	36	36
Women empowerment through income generation activities	01	00	30	30	00	00	00	00	30	30
Minimization of nutrients loss during processing	01	00	21	21	00	00	00	00	21	21
Value addition	01	00	45	45	00	00	00	00	45	45
Value addition fruits and vegetables	01	00	70	70	00	00	00	00	70	70
Total	**11**	**54**	**404**	**438**	**0**	**46**	**46**	**54**	**450**	**504**
VI Agril. Engineering										
Use of Plastics in farming practices	01	01	22	23	00	00	00	01	22	23
Post Harvest Technology	01	50	00	50	00	00	00	50	00	50
Soil & Water Conservation	01	60	00	60	00	00	00	60	00	60
Green house & net house	01	70	09	79	00	00	00	70	09	79
Solar energy & biogas use & importance	01	00	26	26	00	04	04	00	30	30
Natural Resource Management	01	35	00	35	00	00	00	35	00	35
Value addition	01	10	55	65	00	00	00	10	55	65
Small scale processing	01	0	65	65	00	00	00	0	65	65
Preservation of fruits & vegetables	01	00	00	00	0	30	30	0	30	30
Total	**09**	**226**	**177**	**403**	**0**	**34**	**34**	**226**	**211**	**437**
VII Plant Protection										
Integrated Pest Management	01	26	00	26	03	00	03	29	00	29
Integrated Disease Management	01	22	00	22	00	00	00	22	00	22
Bio-control of pests and diseases	01	50	11	61	00	00	00	50	11	61
Production of bio control agents and bio pesticides	01	55	00	55	00	00	00	55	00	55
Insect pest management in cotton	01	49	9	58	00	00	00	49	9	58
Insect pest management in cow based natural farming	01	30	20	50	00	00	00	30	20	50
Total	**06**	**232**	**40**	**272**	**3**	**0**	**3**	**235**	**40**	**275**
X Capacity Building and Group Dynamics										
Entrepreneurial development of farmers/youths	02	50	00	50	00	00	00	50	00	50
Natural farming training (online)	02	60	00	60	00	00	00	60	00	60

Preparation methods of different botanical pesticides	02	155	20	175	00	00	00	155	20	175
Total	**06**	**265**	**20**	**285**	**0**	**0**	**0**	**265**	**20**	**285**
GRAND TOTAL	**44**	**1213**	**735**	**1928**	**20**	**88**	**108**	**1233**	**823**	**2056**

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
I Crop Production										
Nutrient management in Summer crops	01	100	00	100	00	00	00	100	00	100
Preparation procedure of liquid organic fertilizer	01	35	00	35	00	00	00	35	00	35
Organic farming/Natural Farming	07	372	241	613	00	00	00	372	241	613
Fertigation and foliar application of fertilizers	01	47	00	47	00	00	00	47	00	47
Total	**10**	**554**	**241**	**795**	**0**	**0**	**0**	**554**	**241**	**795**
II Horticulture										
a) Vegetable Crops										
Production of low value and high value crops	01	40	20	60	00	00	00	40	20	60
Total (a)	**01**	**40**	**20**	**60**	**00**	**00**	**00**	**40**	**20**	**60**
b) Fruits										
Natural farming in horticulture crop	01	75	00	75	15	00	15	90	00	90
Total (b)	**01**	**75**	**00**	**75**	**15**	**00**	**15**	**90**	**00**	**90**
g) Medicinal and Aromatic Plants										
Information about medicinal plant	01	40	12	52	05	00	05	45	12	57
Total (g)	**01**	**40**	**12**	**52**	**05**	**00**	**05**	**45**	**12**	**57**
Grand Total (a to g)	**03**	**155**	**32**	**187**	**20**	**0**	**20**	**175**	**32**	**207**
III Soil Health and Fertility Management										
Integrated Nutrient Management	01	21	00	21	00	00	00	21	00	21
Soil and Water Testing	01	30	00	30	00	00	00	30	00	30
Total	**2**	**51**	**00**	**51**	00	00	00	**51**	**00**	**51**
IV Livestock Production and Management										
Awareness about lumpy virus in animals	01	09	51	60	00	00	00	09	51	60
Clean milk production	01	00	51	51	00	00	00	00	51	51

Total	**02**	**09**	**102**	**111**	**00**	**00**	**00**	**09**	**102**	**111**
V Home Science/Women empowerment										
Household food security by kitchen gardening and nutrition gardening	02	00	71	44	00	10	10	00	81	81
Design and development of low/minimum cost diet	02	00	71	62	00	06	06	00	77	77
Minimization of nutrient loss in processing	01	00	48	00	00	00	00	00	48	48
Gender mainstreaming through SHGs	02	06	58	64	00	05	05	06	63	69
Value addition	02	00	50	50	00	00	00	00	50	50
Women empowerment	04	00	103	103	00	07	07	00	110	110
Location specific drudgery reduction technologies	01	00	45	45	00	06	06	00	51	51
Women and child care	01	00	18	18	00	03	03	00	21	21
Total	**15**	**6**	**464**	**386**	**0**	**37**	**37**	**6**	**501**	**507**
VI Agril. Engineering										
Installation and maintenance of micro irrigation system	02	00	71	44	00	10	10	00	81	81
Repair and maintenance of farm mach. &impl.	02	00	71	62	00	06	06	00	77	77
Small scale processing and value addition	01	00	48	00	00	00	00	00	48	48
Rainwater harvesting, drainage system	02	06	58	64	00	05	05	06	63	69
Post harvest tech. processing & value addition	02	00	50	50	00	00	00	00	50	50
Use of plastics in farming practices & mandap practice for vegetable crops	04	00	103	103	00	07	07	00	110	110
Renewable energy source utilization on farm	01	00	45	45	00	06	06	00	51	51
Total	**14**	**6**	**446**	**368**	**0**	**34**	**34**	**6**	**480**	**486**
VII Plant Protection										
Integrated Pest Management	01	29	00	29	00	00	00	29	00	29
Integrated Disease Management	01	45	00	45	00	00	00	45	00	45
Bio-control of pests and diseases	01	51	34	85	00	00	00	51	34	85
Cow based prakruticshibir on pest management	06	398	110	508	00	00	00	398	110	508
Pest and disease management in Rabi crops	01	42	00	42	00	00	00	42	00	42
Total	**10**	**565**	**144**	**709**	**00**	**00**	**00**	**565**	**144**	**709**
X Capacity Building and Group Dynamics										
Awareness regarding entrepreneurship scope and opportunity	03	373	107	480	00	00	00	373	107	480

Scientific cultivation of *rabi crop*	01	25	00	25	00	00	00	25	00	25
Natural farming	03	80	00	80	00	00	00	80	00	80
Total	**07**	**478**	**107**	**585**	**0**	**0**	**0**	**478**	**107**	**585**
GRAND TOTAL	**63**	**1824**	**1536**	**3192**	**20**	**71**	**91**	**1844**	**1607**	**3451**

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
I Crop Production										
Organic farming/Natural Farming	03	72	62	134	00	00	00	72	62	134
Balance use of fertilizers	01	30	00	30	00	00	00	30	00	30
Use and importance of Bio fertilizer	01	35	12	47	00	00	00	35	12	47
Prakrutik Kheti	01	78	0	78	00	00	00	78	0	78
Scientific Cultivation of Kharif crops	01	55	0	55	00	00	00	55	0	55
Nutrient management in Summer crops	01	100	00	100	00	00	00	100	00	100
Preparation procedure of liquid organic fertilizer	01	35	00	35	00	00	00	35	00	35
Organic farming/Natural Farming	07	372	241	613	00	00	00	372	241	613
Fertigation and foliar application of fertilizers	01	47	00	47	00	00	00	47	00	47
Total	**17**	**824**	**315**	**1139**	**00**	**00**	**00**	**824**	**315**	**1139**
II Horticulture										
a) Vegetable Crops										
Nursery raising	01	25	10	35	04	05	09	29	15	44
Production of low value and high value crops	01	40	20	60	00	00	00	40	20	60
Total (a)	**02**	**65**	**30**	**95**	**04**	**05**	**09**	**69**	**35**	**104**
b) Fruits										
Production technology of fruit	01	31	00	31	04	00	04	35	00	35
Natural farming in horticulture crop	01	75	00	75	15	00	15	90	00	90
Total (b)	**02**	**106**	**00**	**106**	**19**	**00**	**19**	**125**	**00**	**125**
f) Spices										
Production technology of spices crops	01	39	10	49	09	03	12	48	13	61
Total (f)	**01**	**39**	**10**	**49**	**09**	**03**	**12**	**48**	**13**	**61**

g) Medicinal and Aromatic Plants										
Information about medicinal plant	01	40	12	52	05	00	05	45	12	57
Total (g)	**01**	**40**	**12**	**52**	**05**	**00**	**05**	**45**	**12**	**57**
Grand Total (a to g)	**06**	**250**	**52**	**302**	**37**	**8**	**45**	**287**	**60**	**347**
III Soil Health and Fertility Management										
Integrated Nutrient Management	02	52	00	52	00	00	00	52	00	52
Soil and Water Testing	02	70	00	70	00	00	00	70	00	70
Total	**04**	**122**	**00**	**122**	**00**	**00**	**00**	**122**	**00**	**122**
IV Livestock Production and Management										
Awareness about lumpy virus in animals	01	09	51	60	00	00	00	09	51	60
Clean milk production	01	00	51	51	00	00	00	00	51	51
Total	**02**	**09**	**102**	**111**	**00**	**00**	**00**	**09**	**102**	**111**
V Home Science/Women empowerment										
Household food security by kitchen gardening and nutrition gardening	04	54	114	141	0	14	14	54	128	182
Design and development of low/minimum cost diet	03	0	91	62	0	14	14	0	105	105
Value addition	04	0	161	161	0	24	24	0	185	185
Location specific drudgery reduction technologies	02	0	98	98	0	6	6	0	104	104
Rural Crafts	01	00	26	26	00	04	04	00	30	30
Women and child care	02	0	48	48	0	9	9	0	57	57
Women empowerment through income generation activities	05	0	133	133	0	7	7	0	140	140
Minimization of nutrients loss during processing	02	0	69	21	0	0	0	0	69	69
Value addition fruits and vegetables	01	00	70	70	00	00	00	00	70	70
Gender mainstreaming through SHGs	02	06	58	64	00	05	05	06	63	69
Total	**26**	**60**	**868**	**824**	**0**	**83**	**83**	**60**	**951**	**1011**
VI Agril. Engineering										
Use of Plastics in farming practices	01	01	22	23	00	00	00	01	22	23
Post Harvest Technology	01	50	00	50	00	00	00	50	00	50
Soil & Water Conservation	01	60	00	60	00	00	00	60	00	60
Green house & net house	01	70	09	79	00	00	00	70	09	79
Solar energy & biogas use & importance	01	00	26	26	00	04	04	00	30	30

Natural Resource Management	01	35	00	35	00	00	00	35	00	35
Value addition	01	10	55	65	00	00	00	10	55	65
Small scale processing	01	0	65	65	00	00	00	0	65	65
Preservation of fruits & vegetables	01	00	00	00	0	30	30	0	30	30
Installation and maintenance of micro irrigation system	02	00	71	44	00	10	10	00	81	81
Repair and maintenance of farm mach. &impl.	02	00	71	62	00	06	06	00	77	77
Small scale processing and value addition	01	00	48	00	00	00	00	00	48	48
Rainwater harvesting, drainage system	02	06	58	64	00	05	05	06	63	69
Post harvest tech. processing & value addition	02	00	50	50	00	00	00	00	50	50
Use of plastics in farming practices & mandap practice for vegetable crops	04	00	103	103	00	07	07	00	110	110
Renewable energy source utilization on farm	01	00	45	45	00	06	06	00	51	51
Total	**23**	**232**	**623**	**771**	**0**	**68**	**68**	**232**	**691**	**923**
VII Plant Protection										
Integrated Pest Management	01	26	00	26	03	00	03	29	00	29
Integrated Pest Management	01	29	00	29	00	00	00	29	00	29
Integrated Disease Management	01	22	00	22	00	00	00	22	00	22
Integrated Disease Management	01	45	00	45	00	00	00	45	00	45
Bio-control of pests and diseases	01	50	11	61	00	00	00	50	11	61
Bio-control of pests and diseases	01	51	34	85	00	00	00	51	34	85
Production of bio control agents and bio pesticides	01	55	00	55	00	00	00	55	00	55
Insect pest management in cotton	01	49	9	58	00	00	00	49	9	58
Insect pest management in cow based natural farming	01	30	20	50	00	00	00	30	20	50
Cow based prakruticshibir on pest management	06	398	110	508	00	00	00	398	110	508
Pest and disease management in Rabi crops	01	42	00	42	00	00	00	42	00	42
Total	**16**	**797**	**184**	**981**	**3**	**0**	**3**	**800**	**184**	**984**
X Capacity Building and Group Dynamics										
Entrepreneurial development of farmers/youths (value addition of pulse)	02	50	00	50	00	00	00	50	00	50
Natural farming training (online)	02	60	00	60	00	00	00	60	00	60
Preparation methods of different botanical pesticides	02	155	20	175	00	00	00	155	20	175
Awareness regarding entrepreneurship scope and	03	373	107	480	00	00	00	373	107	480

opportunity										
Scientific cultivation of *rabi crop*	01	25	00	25	00	00	00	25	00	25
Natural farming	03	80	00	80	00	00	00	80	00	80
Total	**13**	**743**	**127**	**870**	**0**	**0**	**0**	**743**	**127**	**870**
GRAND TOTAL	**107**	**3037**	**2271**	**5120**	**40**	**159**	**199**	**3077**	**2430**	**5507**

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

Area of training	No. of Courses	No. of Participants								
		General/Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Rainwater harvesting	01	42	00	42	10	00	10	52	00	52
Value addition	01	00	66	66	00	24	24	00	90	90
Natural farming	01	15	15	30	00	00	00	15	15	30
Scope of value addition in spices crop	01	46	00	46	00	00	00	46	00	46
Agricultural entrepreneurship opportunity (B.Sc. Agri. students)	01	30	29	59	06	02	08	36	31	67
Importance of fruits & veg. & their preservation	01	0	20	20	00	00	00	0	20	20
Value addition fruits and vegetables	02	0	87	87	00	00	00	0	87	87
Scientific cultivation of cotton	01	20	0	20	00	00	00	20	0	20
TOTAL	**09**	**153**	**217**	**370**	**16**	**26**	**42**	**169**	**243**	**412**

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

Area of training	No. of Courses	No. of Participants								
		General/ Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Value addition	02	00	55	55	00	09	09	00	64	64
Women Empowerment	01	00	59	59	00	10	10	00	69	69
Market intelligence	01	80	00	80	00	00	00	80	00	80
TOTAL	**04**	**80**	**114**	**194**	**0**	**19**	**19**	**80**	**133**	**213**

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

Area of training	No. of Courses	No. of Participants								
		General/ Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Rainwater harvesting	01	42	00	42	10	00	10	52	00	52
Value addition	03	0	121	121	0	33	33	0	154	154
Natural farming	01	15	15	30	00	00	00	15	15	30
Scope of value addition in spices crop	01	46	00	46	00	00	00	46	00	46
Agricultural entrepreneurship opportunity (B.Sc. Agri. students)	01	30	29	59	06	02	08	36	31	67
Importance of fruits & veg. & their preservation	01	0	20	20	00	00	00	0	20	20
Value addition fruits and vegetables	02	0	87	87	00	00	00	0	87	87
Scientific cultivation of cotton	01	20	0	20	00	00	00	20	0	20
Women Empowerment	01	00	59	59	00	10	10	00	69	69
Market intelligence	01	80	00	80	00	00	00	80	00	80
TOTAL	**13**	**233**	**331**	**564**	**16**	**45**	**61**	**249**	**376**	**625**

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

Area of training	No. of Courses	No. of Participants								
		General/ Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Trustworthy source of agricultural information	01	44	12	56	00	00	00	44	12	56
Insect pest management in cotton	02	93	12	65	9	9	18	102	21	123
TOTAL	**03**	**137**	**24**	**121**	**9**	**9**	**18**	**146**	**33**	**179**

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

Area of training	No. of Courses	No. of Participants								
		General/ Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Income generation activities (Rakhi Mandal Group)	01	00	35	35	00	03	03	00	38	38
TOTAL	**01**	**00**	**35**	**35**	**00**	**03**	**03**	**00**	**38**	**38**

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

Area of training	No. of Courses	No. of Participants								
		General/ Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Trustworthy source of agricultural information	01	44	12	56	00	00	00	44	12	56
Insect pest management in cotton	02	93	12	65	9	9	18	102	21	123
Income generation activities (Rakhi Mandal Group)	01	00	35	35	00	03	03	00	38	38
TOTAL	**4**	**137**	**59**	**156**	**9**	**12**	**21**	**146**	**71**	**217**

Sponsored training programmes

Area of training	No. of Courses	No. of Participants								
		General/ Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Crop production, management and plant protection										
Scientific cultivation of cotton	01	20	0	20	0	0	0	20	0	20
PrakrutikKheti	01	78	0	78	0	0	0	78	0	78
Scientific Cultivation of Kharif crops	01	55	0	55	0	0	0	55	0	55
Insect pest management in cotton	02	93	12	65	9	9	18	102	21	123
Insect pest management in cow based natural farming	01	30	20	50	0	0	0	30	20	50
Total	**06**	**276**	**32**	**268**	**9**	**9**	**18**	**285**	**41**	**326**
Post harvest technology and value addition										
Processing and value addition	4	10	170	180	0	0	0	10	170	180
Total	**4**	**10**	**170**	**180**	**0**	**0**	**0**	**10**	**170**	**180**
Home Science										
Value addition fruits and vegetables	4	0	202	202	0	0	0	0	202	202
Total	**4**	**0**	**202**	**202**	**0**	**0**	**0**	**0**	**202**	**202**
Agricultural Extension										
Preparation methods of different botanical pesticides	02	155	20	175	00	00	00	155	20	175
Total	**02**	**155**	**20**	**175**	**00**	**00**	**00**	**155**	**20**	**175**
GRAND TOTAL	**16**	**441**	**424**	**825**	**9**	**9**	**18**	**450**	**433**	**883**

Details of vocational training programmes carried out by KVKs for rural youth (4 or more days)

Area of training	No. of Courses	No. of Participants								
		General/ Others			SC/ST			Grand Total		
		Male	Female	Total	Male	Female	Total	Male	Female	Total
Home Science										
Bakery Products Development	01	10	55	65	0	0	0	10	55	65
Total	**01**	**10**	**55**	**65**	**0**	**0**	**0**	**10**	**55**	**65**
Grand Total	**01**	**10**	**55**	**65**	**0**	**0**	**0**	**10**	**55**	**65**

3.5. Extension Programmes

Activities	No. of programmes	No. of farmers	No. of Extension Personnel	Total
Agromet advisory Services weather bulletin	1144	1144	35	1179
Whatsapp group				
i. DAMU	19	3411	00	3411
ii. Home Science and Agriculture	10	534	00	534
Engineering	04	1068	00	1068
iii. Agriculture Extension	05	1159	00	1159
iv. Plant protection and Agronomy				
Diagnostic visits	13	293	05	298
Field Day and field visit	46	493	03	496
Group discussions	09	189	00	189
Film Show	05	236	00	236
KisanMela	01	245	5	250
Scientists' visit to farmers field	46	653	08	661
Farmers visit to KVK	20	680	00	680
Ex-trainees Sammelan	02	275	-	275
Farmers' seminar/workshop	01	285	00	285
Method Demonstrations	10	154	8	162
Celebration of important and special days	13	1842	25	2622
Exposure visits	07	735	00	735
Lecture Delivered	155	4887	15	4902
Total	**-**	**18283**	**104**	**19142**

Note- Advisory services includes social media, website, telephonic calls etc.

Details of other extension programmes:

Particulars	Number
Extension Literature	1
Newspaper coverage	21
Popular articles	3
Radio Talks	50
TV Talks	-
Animal health camps (Number of animals treated)	-
Social Media (No. of platforms Used)	4
Total	**79**

3.6 Online activities during year 2022

S. No.	Activity Type	Mode of implementation	Title of Program	No. of Programmes	No. of Participants / Views
A	Farmers training				
B	Farmers scientist's interaction programme				
C	Farmers seminars				
D	Expert lectures				
1	One Day webinar by NSS Unit, Polytechnic in Agricultural Engineering, AAU,	ZOOM App	Catch the Rain Webinar	1	60

	Dahod & Nehru Yuva Kendra, Dahod				
	Total			1	60
E	Students study tour				
1	Online Education Tour of Poly. In Agril. Engg., NAU, Dediapada	ZOOM App	Micro irrigation, mulching & Rainwater harvesting	1	43
2	Online Education Tour of Poly. In Agril. Engg., AAU, Dahod	ZOOM App	Rainwater harvesting, Erosion & Groundwater recharge techniques	1	45
	Total			2	88
	Grand Total (A+B+C+D+E)			**3**	**140**

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

Production of seeds by the KVKs

Crop	Name of the crop	Name of the variety	Name of the hybrid	Quantity of seed (q)	Value (Rs)	Number of farmers
Cereals	Wheat	GJW-463	-	5960	-	-
Oilseeds	Groundnut	GJG-22	-	2530	-	-
	Groundnut	GJG-22	-	1980	-	-
	Groundnut	GJG-32	-	4170	-	-
	Sesame	GJT-5	-	705	-	-
Pulses	Chickpea	GJG-5	-	1580	-	-
Total				**16925**		

Production of planting materials by the KVK: NIL

Production of Bio-Products: NIL

Production of livestock materials: NIL

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

A. KVK News Letter: JAU, News Letter 3 times yearly by University

B. Literature developed/published

Item	Title	Authors name
Book	Technological Empowerment of Farm women in drudgery reduction technologies in agriculture and animal husbandry	Dr. Neha Tiwari and Dr. J. N. Vyas
	A comparative study of extent of participation in household Activities and attitude about performing activities by young and old couple of Mehsana District	Dr. J. N. Vyas and Dr. Neha Tiwari

Book chapter	Morphometric Analysis	Dr. P. S. Jayswal and Er. K. N. Sondarva
Research papers	Assessment of influencing determinants on maternal health and wellness: A descriptive research study	Dr. Neha Tiwari
	To assess the practices and attitude regarding iron deficiency anemia in adolescence girls of Amreli	Dr. Neha Tiwari and Dr. N.S Joshi
	Technological needs of farmwomen in processing and preservation of fruits	Dr. Neha Tiwari
	Effect of plastic mulch on cotton yield and its economics	P. S. Jayswal, N. S. Joshi, K. N. Sondarva
	Knowledge level of dairy farmers regarding scientific dairy husbandry practices	P. S. Kapadiya , P. N. Chaudhari and V. S. Parmar
	Patency and facilities for animal husbandry practices of livestock owners in amrelidistrict of gujarat.octomber,2022	P.S Kapadiya, P. N. Chaudhari and V. S. Parmar M. R. gadariyaU.A. Chauha N.B. Jadav andP.R. Kanani
	Yield gap analysis through front line demonstration of integrated nutrient management in cotton	P. J. Prajapati, N. M. Kachhadiya and V. S. Parmar
Technical reports	Monthly (Gujarati, English)	
	Quarterly (Gujarati, English)	
	Six monthly (Gujarati, English)	
	Nine monthly (Gujarati, English)	
	Annual report (Gujarati, English)	
	ZREAC Rabi 2022-23 Summer 2022	
	ZREAC Kharif 2022-23	
	SAC 2023	
Popular articles	Aaj na samay ma mulayavardhan nu Krishi maate mahatv આજ ના સમય માં મૂલયવર્ધનનું કૃષિ માટે મહત્વ	Dr. Neha Tiwari & Dr. N. S. Joshi
	Vividh pako maate malch na faayada વિવિધ પાકો માટે મલ્ચના ફાયદા	Dr. P S. Jayswal & Er. K. N. Sondarva
	Bajaranaa mulyavardhan thi banati vishishat vangiyo બાજરાના મુલ્યવર્ધનથી બનતી વિશિષ્ટ વાનગીઓ	Dr. Neha Tiwari, Dr. P. S. Jayswal & Dr. J. N. Vyas
Extension literature	Mausami falo dvaaraa taiyar thati aarogyaprad ane paushtik vanagiyo મોસમી ફળો દ્વારા તૈયાર થતી આરોગ્યપ્રદ અને પોષ્ટિક વાનગીઓ	Dr. N. Tiwari, Dr. N. S. Joshi, Dr. J. N. Vyas, Dr. P S. Jayswal, Mr. V. S. Parmar, Mr. P. J. Prajapati, Mr. N.M. Kachhadia, Mr. N. J. Hadiya & Mr. N. B. Ghoniya

C. Details of Electronic Media Produced: NIL

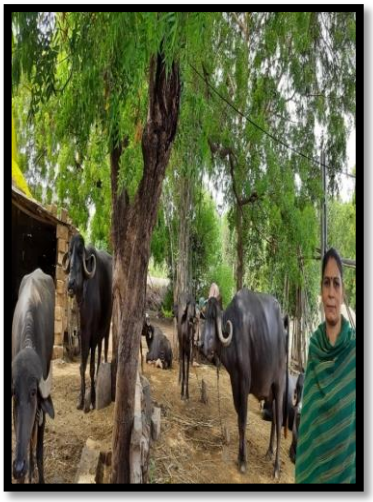
D. Details of Social Media Platforms Created / Used:

SN	Type of social media platform	Title of social media	Number of Followers/ Subscribers
1	YouTube Channel	Amreli KVK	126
2	Facebook page/ Account	KVK Amreli	65
3	Mobile Apps	-	-
4	WhatsApp groups	5	320
5	Twitter Account	KVK Amreli	24
6	Any other (Pl. Specify)	-	-

E. Success Stories

Success Story-1 Progressive Woman Farmer

1. **Situation analysis/Problem statement:** Neetaben Virpara is a successful farmer of amreli district. She faced problems like lack of training programme regarding vegetables farming, dairy enterprise and also faced financial problem to start vegetable farming and dairy enterprise.
2. **Plan, Implement and Support**:, Neetaben came in contact of KVK, Amreli and discuss her problem and also express her desire to start a vegetable farming and dairy enterprise,KVK help her in resolving these problem by organizing various training session on vegetable gardening/kitchen gardening and dairy enterprise.
3. **Output**: She started growing vegetables as per seasons and animal husbandry work. She is getting's. 405625/- gross outcome and Rs. 312625 /- net-incomes, due to good quality production. Neetaben also take a information regarding financial support for agriculture and allied areas by Team KVK, Amreli
4. **Outcome**: Neetaben also motivate other farmwomen to start dairy enterprise and vegetable farming so that they can earn income other then farming.
5. **Impact**: Neetaben helps her husband for good education of children by doing dairy enterprise and vegetable farming neetaben also improved her socio- economic status in the society.


Success Story-2 Progressive Woman Farmer

1. **Situation analysis/Problem statement:** Varshaben Khunt is a progressive farmer of Amreli district. She had a strong desire to start her small scale business. She faced problems like lack of training programme regarding dairy enterprise and also faced financial problem to start her clothing store and dairy enterprise.
2. **Plan, Implement and Support**: She wanted to start her small scale business, in that KVK team and other government institution helped her to fulfill her desire. Now she had small scale business like Doodh Utpadan Sahakari Mandali ltd. at Randal na dadva, and also running clothing store which is named Varshaben mini mall and Beauty Parlor at her home. Varshaben also take part in various training programme organized by KVK, Amreli and now she is farming organic groundnut at her farm.
3. **Output**: She is getting Rs. 502500/- gross outcome and Rs. 4,12000/- net-incomes, through her small scale business.
4. **Outcome**: She helped other farmwomen to start dairy enterprise and gruh udhyog so that they can earn income other then farming.
5. **Impact**: She helps her husband for good education of children by doing dairy enterprise and clothing store. She also improved her socio- economic status in the society. She also opened her own clothing store which is named **Varshaben mini mall.**




Success Story-3 Income generated through Value addition

1. **Situation analysis/Problem statement:** Maganbhai Jadavbhai Sorathiya is a successful organic farmer of Amreli district. He faced problems like lack of low prices of produce, competitive market with other non organic products.
2. **Plan, Implement and Support**: Maganbhai decided to overcome market price problem, for which he has done many survey and landed as a solution at KVK, JAU, Amreli and discuss his problem. KVK scientist helped him in resolving these problem by trainings on organic farming certification, marketing strategies, small scale processing and value addition.
3. **Output**: He was producing sugarcane by the time and started value addition of various other produces as medicated hair oil and soap. His products are sold in nearby market as well as various big cities like Surat, Rajkot, Amreli etc. Being effective and organic products, his customers are getting attracted to the products. He has spent near about Rs.7 lakh for production and in year 2022, earned Rs. 80,000/- as net profit from only value added products.
4. **Outcome**: Maganbhai also motivates other farmers for to start organic farming, small scale processing and value addition so that they can earn income other then farming and also save natural resources.
5. **Impact**: Maganbhai has spread awareness in many farmers of nearby and other farmers.


Farmer at his wheat field


Value added products

Success Story-4:

1. **Situation analysis/Problem statement:** Jayantibhai has been associated with agriculture for 15 years. They grow cotton and groundnut earlier under chemical farming, but the cost was high, and the yield was low, and the prices were not good. Then they received training on organic farming in association with Agriculture University, KVK and ATMA, Project and then practiced Natural farming for the last four years in all crops.
2. **Plan, Implement and Support**: Then they received training on organic farming in association with Agriculture University, KVK and ATMA, Project and then practiced Natural farming for the last four years in all crops. KVK, Amreli provides information and gives training to jayantibhai for practices of natural farming in various crops and guide to value addition in various crops and create market channel to sell them products of natural farming.
3. **Output**: He grows groundnut, cotton, soybean, chilli and sunflower in kharif season and of ajwain, wheat and chickpea in winter season in mix crops. Application of Ghan Jivamrut, Jivamrut to crops under natural farming and to control of pest and diseases he applies natural pesticides prepare from neem, Calotropis, karanj, castor, custard etc.,
4. **Outcome**: He grows groundnut, cotton, soybean, chilli and sunflower in kharif season and of ajwain, wheat and chickpea in winter season in mix crops. He values addition in all crops and make packets and sell directly to consumers.
5. **Impact**:

Parameters	Natural Farming (Area in ha)	Conventional Farming (Area in ha)
Name of Crop 1	Groundnut (oil production)	cotton
Cost of cultivation (Rs)	31250	54650
Oil Production (q)	6.15	18.60
Gross return (₹)	195250	126480
Net return (₹)	164000	71830
BC ratio	5.25	2.31
Name of Crop 2	Wheat	Wheat
Cost of cultivation (Rs)	29580	54250
Production (q)	41.00	43.50
Gross return (₹)	175900	130500
Net return (₹)	146320	76250
BC ratio	4.94	2.40
Name of Crop 3	Chilli	Chilli
Cost of cultivation (Rs)	48520	65840
Powder Production (q)	8.50	9.10
Gross return (₹)	280500	182000
Net return (₹)	232250	116160
BC ratio	5.78	2.76

Install Natural Farming Board at farm house

Rearing cows for Milk, Urine and Dung

Stores of Natural preparation

Preparation of Jivamrut

Value addition of Chilli and Packets of Chilli

Natural Groundnut oil Tin

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

Sr. No.	Crop/ Enterprise	Innovative Technology
1	Cumin	Line sowing instead of broadcasting
2	Cotton	Irrigation in alternate furrow
		Application of fertilizer in nitrogenous form
3	Groundnut	Application of fertilizer in SSP and Ammonium Sulphate form
4	Wheat	Spraying of DiEthane M-45 at milking stage to avoid diseases.

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

SN	Crop / Enterprise	ITK Practiced	Purpose of ITK
1	All Line sowing crops	Manually operated seed drill	Sowing purpose
2	Groundnut/Cotton	Sprayer operating by Bicycle	Spraying purpose
3	Cotton	Extraction of cow urine with dhatura and desi akda	For the control of sucking pest of cotton
4	Cotton	Fermented Bajra extract	Larvae of cotton pest
5	Pulses and cereals	Use of Neem leaves	Storage purpose
6	Castor	Use of milk of Castor	Stem rot of castor
7	Wheat	Extraction of custard apple leaves, neem, karmariya, ankdo, cow urine, butter milk (Parshotambhai Shambhubhai Hirpara, village: Khadkhd)	Root strengthening and good feeling grain of wheat crop
8	All crops	Extract mix of onion, garlic, ankdo, cow urine (Arvindbhai Popatbhai Bhesania, village: Khad khad)	Control of sucking pests.
		Extract of asefatida, turmeric, and ajma (Hasmukhbhai Mohanbhai Kyada, village: Khicha)	
9	All crops	Extract of ankdo, neem, custard apple, bilipatra, dhaturo and cow urine. (Jayantibhai Dabhi, village: Kariyana)	Insects infestations
10	All crops	Extract of akdo, water and cow urine. (Bhanubhai Shambhubhai Hirpara, village: Khadkhad)	Sulpher and potash deficiency in crops
11	All crops	Mixture of milk, jaggary and water (Yogeshbhai Pandya , village: Vavdi)	Crop growth
12	All crops	Mixture of coconut water and water (Yogesh bhai Pandya , village: Vavdi)	Increasing number of flowers

5.1. Indicate the specific training need analysis tools/methodology followed for

A. Practicing Farmers

a) Power point presentation
b) Posters
c) Live samples

B. Rural Youth

a) Power point presentation
b) Posters
c) Live samples
d) Film/ video show

C. In-service personnel

a) Power point presentation
b) Posters
c) Live samples

5.2. Indicate the methodology for identifying OFTs/FLDs

For OFT:

i) PRA
ii) Field level observations
iii) Farmer group discussions

For FLD:

i) New variety/technology
ii) Poor yield at farmers level
iii) Existing cropping system

5.3. Field activities

Name of villages identified/adopted with Amreli block name (from which year)	No. of farm families selected per village	No. of survey/ PRA conducted	No. of technologies taken to the adopted villages	Name of the technologies found suitable by the farmers of the adopted villages	Impact (production, income, employment, area/technological horizontal/vertical)	Constraints if any in the continued application of these improved technologies
Hathigadh	Whole village	15	07	• New varieties of various crops like groundnut, cotton, sesame, wheat etc. • INM • IPM • IDM • Natural resource conservation • New farm machineries • Animal feed management	• Overall increase in production of crops and income of farmers. • Due to good results of crop demonstration adoption of new varieties increased and area under crop increased.	Getting farmers convinced about new technology adoption.
Jasvantgadh						
Randhiya						
Ingorala						
Devgam						
Rikadiya						
Kuvargadh						
Ramgadh						
Dhajda						
Jambarvada						
KhadKhad						
Rafala						
Sukhpar						
Fachariya						
Sekhpipariya						

6. LINKAGES

A. Functional linkage with different organizations

Name of organization	Nature of linkage
Dy. Director of Agriculture.	Conducting training programmes
Dy. Director of Agril. Extension (FTC)	Conducting training programmes
Dy. Director of Horticulture	Conducting training programmes
Dy. Director of Animal Husbandry	Conducting training programmes
Dy. Director of Soil Conservation	Conducting training programmes
Dy. Director of Social Forestry	Conducting training programmes
Amreli Jilla Madhya sahakari bank	Conducting training programmes
Milk Co-Operative Society	Conducting training programmes
State Bank of India	Conducting training programmes
National Bank for Agriculture & Rural Development (NABARD)	Conducting training programmes
NHRDF	Conducting training programmes
Doordarshan Kendra	Conducting training programmes
All India Radio	Conducting training programmes
District Rural Development Agency	Conducting training programmes
ATMA	Conducting training programmes
Mahindra & Mahindra Co. Ltd.	Conducting training programmes
GGRC	Conducting training programmes

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

SN	Name of the scheme	Date/ Month of initiation	Funding agency	Amount (Rs.)
1.	Agricultural Technology Information Centre (ATIC)	2005-06	State Government	850000
2.	Cluster base FLD of Rabi Pulses under NFSM	2015-16	ICAR, New Delhi	780896
3.	National Mission on Oilseeds and Oil Palm (NMOOP)	2015-16		137204
4.	Attracting and Retaining Youth in Agriculture (ARYA)	2019-20		1506628
5	DAMU	2019-20		621057
6.	Out scaling of Natural farming	2022-23		260000
7.	IRM: Dssemination of Pink bollwarm management strategies	2022-23	CICR, Nagpur and ICAR, New Delhi	4,10,000

C. Details of linkage with ATMA

a) Is ATMA implemented in your district: Yes

Co-ordination activities between KVK and ATMA

SN	Programme	Particulars	No. of programmes attended by KVK staff	No. of programmes Organized by KVK	Other remarks (if any)
01	**Meetings**	Field day	4	-	-
02	**Research projects**	-	-	-	-
03	**Training programmes**	8	8	8	-

04	**Demonstrations**				
05	**Extension Programmes**				
	Special day celebration	4	-	4	-
06	**Publications**	-	-	-	-
07	**Other Activities**				
	Farmers field visit	22			ATMA & KVK combined activity
	Best farmer award visit	20			
	ATMA AMC/GB/ KVK SAC meeting	4			
	ATMA & KVK combine planning meeting	5			

D. Give details of programmes implemented under National Horticultural Mission: NIL

E. Nature of linkage with National Fisheries Development Board: NIL

F. Details of linkage with RKVY: NIL

G. Details of linkage with PKVY (Paramparagat Krishi Vikas Yojana): NIL

H. Details of linkage with NFSM

S. No.	Programme	Nature of linkage	Funds received if any Rs.	Expenditure during the reporting period in Rs.	Remarks
1	Trainings and FLDs	Trainings and FLDs	360000	86700	-

I. Details of linkage with SMAF (Sub-mission on Agroforestry): NIL

7. Convergence with other agencies and departments: NIL

8. Innovative Farmers Meet

SN	Particulars	Details
1	Have you conducted Farm Innovators meet in your district?	No

9. Farmers Field School (FFS): NIL

10.1. Technical Feedback of the farmers about the technologies demonstrated and assessed:

Crop	Variety/Input	Farmers' reaction
Gram	GJG-3	► High Yield Variety ► Bold seeded Variety ► Stunt virus resistant Variety
Cumin	IDM	►Less problem of wilt due to application of Trichoderma ►Less problem of blight and powdery mildew due to spraying of carbendazim and Hexaconazole
Wheat	GW-173	►Resistant to Shoot borer ►High yielding ►Best for late sowing
Wheat	GJW-463	►High Yield Variety ►Grain quality is good
Green Gram	GAM-5	►Highly resistant to Yellow Mosaic Virus (YMV) ►Bold seed size with attractive shiny grain appearance

Groundnut	GJG-22	►Higher production ►Less stem rot problems ►Quality of seed is good
Sesame	GT-4	►Bold seeded, whiteness more and higher production then other varieties
Cotton	INM	► Less reddening of leaves ►Higher Yield
Cotton	GTHH-49	► Higher Yield ►Suitable for High density planting
Cotton	IPM	► Better control of pests ►Economic to other chemical pesticides
Castor	GCH-9	►Resistance to wilt, root rot and tolerant to sucking pests ►Higher Yield
Sorghum	GFS-5	►High yielder ►Resistance to major pests and diseases and suitable under drought condition
Pigeon Pea	GJP-1	►High yielding ►Bright white colored seed gives good price in market

10.2. Technical Feedback from the KVK Scientists (Subject wise) to the research institutions/universities: We have presented in ZREAC and AGRESCO meetings of university.

11. Technology Week celebration during2022: Yes

Period of observing Technology Week: From 29/08/2022 to 03/09/2022
Online / Offline: Offline
Total number of farmers visited : 153
Total number of agencies involved : 2
Number of demonstrations visited by the farmers within KVK campus: 153

Other Details

Types of Activities	No. of Activities	Number of Farmers	Related crop/livestock technology
Gosthies	2	45	Cotton, Groundnut, Sesame, Millets, Horti. crops
Lectures organized	30	153	-
Exhibition	1	153	-
Film show	5	153	-
Fair	5	153	-
Farm Visit	5	153	-
Diagnostic Practical's	6	153	-
Supply of Literature (No.)	2	153	-
Supply of Seed (q)	1	153	-
Supply of Planting materials (No.)	5	153	-
Total number of farmers visited the technology week	-	153	-

12. Interventions on drought mitigation (if the KVK included in this special programme): NIL

13. IMPACT:
A. Impact of KVK activities (Not to be restricted for reporting period)

INTRODUCTION

The Education Commission (1964-66) recommended that a vigorous effort be made to establish specialized institutions to provide vocational education in agriculture and allied fields at the pre and post matriculate levels to cater the training needs of a large number of boys and girls coming from rural areas. The Commission, further, suggested that such institutions be named as 'Agricultural Polytechnics'. The recommendation of the Commission was thoroughly discussed: during 1966-72 by the Ministry of Education, Ministry of Agriculture, Planning Commission, ICAR and other allied institutions. Finally, the ICAR mooted the idea of establishing Krishi Vigyan Kendras (Agricultural Science Centres) as innovative institutions for imparting vocational training to the practicing farmers, school dropouts and field level extension functionaries. The ICAR Standing Committee on Agricultural Education, in its meeting held in August, 1973, observed that since the establishment of KVKs was of national importance which would help in accelerating the agricultural production as also in improving the socio-economic conditions of the farming community, the assistance of all related institutions should be taken in implementing this scheme. The ICAR, therefore, constituted a committee in 1973 headed by Dr. Mohan Singh Mehta of Seva Mandir, Udaipur (Rajasthan), for working out a detailed plan for implementing this scheme. The Committee submitted its report in 1974.The first KVK, on a pilot basis, was established in 1974 at Puducherry (Pondicherry) under the administrative control of the Tamil Nadu Agricultural University, Coimbatore.

Krishi Vigyan Kendra, an Institutional Innovation inspiring the World in 21st Century also known as Farm Science Centre, a grass root level scheme has been designed and nurtured by the ICAR for the past four decades. Since 1974 when the first KVK was established at Pondicherry, so far, ICAR has established 694 KVKs across the country under different host organization like State Agricultural Universities, ICAR Institutes, Central Institutes/Deemed Universities, State Governments, Public Undertakings and Governmental Organization. Gujarat state is having 30 KVKs of which, 07 KVKs are under Junagadh Agricultural University and Amreli is one of them, established in March, 2005**.**

Gujarat farmers are really very hard working. It is the only state in the country which consistently maintains the highest annual growth rate of agricultural than the national average. It is one of five top five state of India. Gujarat gives the maximum adoration in agricultural technology and being a key institution at district level the KVKs play an important role in transfer of technology. KVK contribute all three dimensional activity like aware the farmers though all possible medium such as folder, leaf late, social media etc second imparting knowledge through on and off campus training with use of different PPT, video, exhibition and by exposure visit etc third one increase adoption of technology through personal contact, CFLD and OFT etc for betterment of farming community. Here very important things do by the scientist to maintain rapport with farming community.KVK must work on the basis of felt and un felt need of farming community understanding their level of knowledge and availability of resources they have, all this to increase adoption of technology.KVK also imparting knowledge in vernacular language for easy understanding of farmers and also motivated them for entrepreneurship through skill development training. Considering these facts, a study entitled **"Image and impact of KVK''** was conducted.

Objectives:

1. To study the profile of beneficiaries of villages adopted by Krishi Vigyan Kendra, Amreli
2. To find out the image and impact of Krishi Vigyan Kendra, Amreli on the beneficiaries of adopted villages.
3. To assess the association between profile of beneficiaries farmers and image Krishi Vigyan Kendra.

Methodology

The present investigation was conduct in adopted villages of KVK Amreli of North Saurashtra region of Gujarat. An ex-post facto design was used for this study. For the selection of respondents, a comprehensive list of beneficiaries and villages adopted by Krishi Vigyan Kendra were identified purposively with discuss with senior scientist and scientist of KVK, Amreli.

Table 1 - Name of selected villages adopted by KVK, Amreli

SN	Selected District	Selected Villages	Selected size of respondents
1	Amreli	Nesadi	20
		Oliya	20
		Shedubhar	20
		Saldi	20
		Babapur	20
		Lunidhar	20
		Kerala	20
		Ditla	20
		Lakhapadar	20
		Halariya	20
		Total	**200**

Twenty respondents from each selected village were randomly selected. Thus the total sample size for the study was 200. The interview schedule was developed keeping in view the specific objectives of the study and the data was collected by survey method during 2019-20.

Image of KVK

To measure the image of KVK, Amreli. Twenty questions about its objectives, activities, and usefulness, helpfulness of the officials, benefit gained by the farmers and general and overall impressions of the centre were asked to the respondents.

The answers of the respondents to each question were marked yes or no. A score of one was assigned to yes answer of response and zero to a no answer or response.

Impact of KVK

For this study the resultant changes occurred due to adoption of recommended agricultural technologies which are transmitted by KVKs in the form of changes have been taken account as impact of KVKs. It is finally defined as the resultant changes occurred due to adoption of recommended agricultural technologies which are transmitted by KVKs in the form of changes those prospered within beneficiary farmers of adopted villages of KVKs.

The change was measured in terms of eight aspects

1) Change in area under field crops
2) Change in use of improved varieties
3) Change in crop production
4) Change in annual income
5) Change in household possession
6) Change in food habit
7) Change in clothing pattern
8) Change in savings and expenditures

1) Change in area under field crops

It refers to the increase in area under field crops after adoption of recommended agricultural technologies which are transmitted by KVKs. Actual area increased in hectare(s) under field crops was taken as a change. The increase in area was statistically measured by using paired “t” test

2) Change in use of improved varieties

It refers to the increase in use of improved varieties after adoption of recommended agricultural technologies which are transmitted by KVKs. The addition found in use of improved

varieties of different crops was considered as change. One score was assigned to each new improved variety which was adopted by the farmers after adoption of recommended agricultural technologies which are transmitted by KVKs. The paired "t" test was applied to know whether the difference found in use of improved varieties was significant.

3) Change in crop production

It refers to the increase in crop production per unit area after adoption of recommended agricultural technologies which are transmitted by KVKs. The more production attained by the farmers as compared to the production had attained before adoption of recommended agricultural technologies which are transmitted by KVKs. The significance of difference in crop production of before and after use was known by using paired "t" test.

4) Change in annual income

Change in annual income from agriculture and other resources after adoption of recommended agricultural technologies which are transmitted by KVKs was operational as change. The paired "t" test was applied to know whether the difference between annual incomes obtained during study year annual income of base year.

5) Change in household possession

Additional household items purchased by the farmers after adoption of recommended agricultural technologies which are transmitted by KVKs were operationalzed as change. Scoring procedure was followed as under:

Eleven statements regarding change in household possession were prepared. The respondents were asked to give their reply to each statement in form of Yes' or No'. The score assigned for 'Yes' and 'No' was 1 and 0, respectively. The score of each statement was summed up to obtain final score indicating change in household possession.

6) Change in food habit

Eight statements regarding change in food habit were prepared. The respondents were asked to give their reply to each statement in form of Yes' or No'. The score assigned for 'Yes' and 'No' was 1 and 0, respectively. The score of each statement was summed up to obtain final score indicating change in food habit.

7) Change in clothing pattern

Six statements regarding change in clothing pattern were prepared. The respondents were asked to give their reply to each statement in form of Yes' or No. The score assigned for 'Yes' and 'No' was 1 and 0, respectively. The score of each statement was summed up to obtain final score indicating change in clothing pattern.

8) Change in savings and expenditures

Eight statements regarding change in savings and expenditure were prepared. The respondents were asked to give their reply to each statement. The reply to each statement was bipolar i.e. Yes or No. The score assigned for Yes and No was 1 and 0 respectively. The score of each statement was summed to obtain final score indicating change in savings and expenditure.

RESULT AND DISCUSSION

Personal profile of the beneficiaries of KVK

The data presented in table 2 indicated that majority of the respondents were found in middle age group (59.50 percent), whereas 30.00 per cent and 10.50 per cent of them were in the old age and young age group respectively. The probable reason might be that due to migration very less young farmers associated with farming.

In case of education 36.50 per cent of the respondents were found in secondary education, whereas 33.50 per cent and 13.00 per cent of them were primary education and college and above education respectively. Only 10.00 per cent and 07.00 per cent were illiterate and high education level. The probable reason might be that due to secondary level education easily available at village level.

Majority of the respondents (58.00 per cent) were found in large family followed by 42.00 per cent lived in small family.

Majority of the respondents (60.00 per cent) have farming with animal husbandry occupation, whereas 31.00 per cent have occupation farming. Only 05.50 per cent and 3.00 have Farming +Animal husbandry+ business and Farming + Animal husbandry+ business+ horticulture occupation respectively. The probable reason might be that due to that most of the respondents livelihood totally depended on agricultural and for regular income they keep the milch animal and also might be that majority of the respondents live in large family.

Majority of the respondents (68.00 per cent) have high level of experience in farming whereas, 20.00 per cent and 12.00 per cent of them have middle and low level of experience respectively.

In case of annual income 39.50 per cent of the respondents have annual income above 2 lakh, whereas 35.00 per cent and 25.50 per cent of them have annual income low and medium level of annual income respectively. The probable reason might be that due to a majority of the respondents occupation was farming + animal husbandry.

Majority of the respondents (52.50 per cent) of the respondents have large land holding whereas, 17.50 per cent and 17.00 per cent have of them have medium and marginal land holding respectively. Moreover 13.00 per cent respondents have small land holding.

Majority of the respondents (61.00 per cent) were found in no social participation where as 30.50 per cent and 6.00 percent of them have poor and good social participation. Only 2.50 per cent of the respondents were found in moderate level of social participation. The probable reason might be that most of the respondents were very active in daily agricultural activities and they have no time for any social activity.

Table 2: Distribution of respondents according to their personal profile

Sr. No.	Personal profile	(n=200)	
		Frequency	Per cent
1	**Age**		
	Young age (up to 35 year)	21	10.50
	Middle age (36 to 50 year)	119	59.50
	Old age (above 50 year)	60	30.00
2	**Education**		
	Illiterate	20	10.00
	Primary education	67	33.50
	Secondary education	73	36.50
	High education	14	07.00
	College and above	26	13.00
3	**Family Size**		
	Small (up to 5 member)	84	42.00
	Large (above 6)	116	58.00
4	**Occupation**		
	Farming	62	31.00
	Farming + animal husbandry	121	60.50
	Farming + Animal husbandry+ business	11	05.50
	Farming +Animal husbandry+ business + horticulture	06	03.00
5	**Farming experience**		
	Low level of experience (Up to 5)	24	12.00
	Medium level of experience (05 to 08)	40	20.00
	High level of experience (above 08)	136	68.00
6	**Annual income**		
	Low (up to 1,00,000)	70	35.00

	Medium (1,00,000 to 2,00,000)	51	25.50
	High (above 2, 00, 000)	79	39.50
7	**Land Holding**		
	Marginal farmers (up to 1 ha)	34	17.00
	Small farmers (1.01 to 2 ha)	26	13.00
	Medium farmers (2.01 to 4 ha)	35	17.50
	Large farmers (More than 4 ha)	105	52.50
8	**Social Participation**		
	No social participation	122	61.00
	Poor social participation	61	30.50
	Moderate social participation	5	02.50
	Good social participation	12	06.00
9	**Mass media exposure**		
	Low (Score up to 09)	62	31.00
	Medium (Score 09 to 16)	112	56.00
	High (Score above 16)	26	13.00
10	**Innovativeness**		
	Low level of innovativeness	67	33.50
	Medium level of innovativeness	109	54.50
	High level of innovativeness	24	12.00

Majority of the respondents (56.00 per cent) were found in medium level of mass media exposure group whereas, 31.00 per cent and 13.00 per cent of them found in low and high level of mass media exposure respectively. The probable reason might be compulsion of internet use by society.

Majority of the respondents (54.00 per cent) were found in medium level of innovativeness whereas, 33.50 per cent and 12.00 per cent of them found in low and high level of innovativeness respectively.

Image and Impact of KVK

According to standard dictionary of education, an image means a form of centrally grouped experience bearing resemblance in structure to a perception. Although, images are based on past perception, they are not simple reflections of these perceptions. To measure the image of KVK, Amreli twenty questions about KVKs' objectives, activities, and usefulness, helpfulness of the officials, benefit gained by the farmers and general and overall impressions of the centers were asked to the beneficiaries.

Table 3: Distribution of respondents according to image of KVK Amreli n=200

SN	Statement	F	%	Rank
1.	KVK organizes short and long term vocational training courses for higher production on farms and for self-employment.	159	79.50	**VII**
2.	KVK conducts Front Line Demonstration to demonstrate the production potentiality of various crops under the farmer's condition and resources.	176	88.00	**IV**
3.	Training given by KVK is an important medium to impart latest know-how to the farmers.	173	86.50	**V**
4.	KVK organizes field days to communicate the innovations to the potential users.	179	89.50	**III**
5.	KVK provides facility for soil and water testing which helps to assess the fertility status of soil.	147	73.50	**VIII**
6.	KVK provides knowledge on need based application of fertilizer and pesticides which helps farmers to save expenditure on fertilizers and pesticides.	190	95.00	**I**
7.	In training programme of KVK communication of field problems to	135	67.50	**X**

	researcher and getting solution is quicker.			
8.	KVK suggests solution to farmers' problems in view of their economic condition.	171	85.50	**VI**
9.	KVK gives knowledge of high yielding variety which is beneficial to increase the yield of crops.	146	73.00	**IX**
10.	KVK personnel, explains the importance of technology in local language through which communication barriers can be avoided.	186	93.00	**II**

The data presented in table 3 indicated that KVK provides knowledge on need based application of fertilizer and pesticides which help farmers to save expenditure on fertilizers and pesticides (95.00 per cent) and ranked first followed by KVK personnel, explains the importance of technology in local language through which communication barriers can be avoided (93.00 per cent), KVK organizes field days to communicate the innovations to the potential users (89.50 per cent), KVK conducts Front Line Demonstration to demonstrate the production potentiality of various crops under the farmer's condition and resources (88.00 per cent), Training given by KVK is an important medium to impart latest know-how to the farmers (86.50 per cent), KVK suggests solution to farmers' problems in view of their economic condition (85.50 per cent), KVK organizes short and long term vocational training courses for higher production on farms and for self-employment (79.50 per cent), KVK provides facility for soil and water testing which helps to assess the fertility status of soil (73.50 per cent), KVK gives knowledge of high yielding variety which is beneficial to increase the yield of crops (73.00 per cent) and In training programme of KVK communication of field problems to researcher and getting solution is quicker were ranked II,III,IV,V,VI,VII,VIII,IX,X respectively. The probable reason might be that young and enthusiastic scientist and total number of projects like NICRA, NFSM, ATIC; NMOOP and DAMU run which cover more number of farmers. Also there were good understanding with line department of agriculture and NGO works in Amreli districts.

Table 4: Relationship between respondent and image of KVK **n=200**

SN	Independent Variables	Coefficient of correlation (r)
1	Age	0.0049 NS
2	Education	0.1655*
3	Family size	-0.0553 NS
4	Occupation	0.0330
5	Farming experience	0.1889**
6	Land holding	0.0887 NS
7	Annual income	-0.0040 NS
8	Social participation	0.0786 NS
9	Mass media exposure	0.1990**
10	Innovativeness	0.1732*

* = significant at 0.05 level, ** = significant at 0.01 level

The data presented in table 4 revealed that farming experience (0.1889**) and mass media exposure (0.1990**) were positively and highly significantly correlated at 0.01 level of probability with the image of KVK. It can be concluded that farming experience and mass media exposure level of respondents influence image of KVK. The probable reason might be due to mass media exposure respondents regularly in the contact of KVK scientist.

Education (0.1655*) and innovativeness (0.1732*) were positively significantly correlated at 0.05 level of probability with the image of KVK. It can be concluded that education and innovativeness level of respondents influence image of KVK. The probable reason might be educated respondent easy to understand technology and innovative farmers ready to adopt this technology first.

Age (0.0049 NS), land holding (0.0887 NS), Social participation (0.0786 NS) were positively and family size (-0.0553 NS), annual income (-0.0040 NS) were negatively but not significantly correlated with image of KVK.

Impact of KVK

Webster describes the impact as the force, impressions or operations of one thing on another, affect a forceful control and collusion. In simple words, it is the effect of one on the other.

For this study, the resultant changes occurred due to adoption of recommended agricultural technologies in the form of changes have been taken as impact of KVKs. It is finally defined as the resultant changes occurred due to adoption of recommended agricultural technologies in the form of changes that prospered within beneficiary farmers of adopted villages of Amreli KVKs. An effort has been made to asses such resultant changes in terms of 8 aspects, *viz.*, Change in area under field crops, change in use of improved varieties, change in crop production, change in annual income, change in household possession, change in food habit , change in clothing pattern, change in savings and expenditures.

Table 5: Aspect wise change occurred as a result of KVK activities n=200

SN	Particulars	Mean Difference	"t" value
1	Area under field crops	0.8826	1.7451 *
2	Use of improved varieties	2.5075	19.3999**
3	Crop production	28.5124	16.1258**
4	Annual income	0.2851	11.4824**
5	Household possession	1.6069	11.3950**
6	Food habit	0.7960	5.5643**
7	Clothing pattern	0.3333	02.7022**
8	Savings and expenditures	1.3284	13.3788**
	Over all change	4.5784	10.7833**

* = significant at 0.05 level, ** = significant at 0.01 level

The data presented in table 5 revealed that change in use of improved varieties, change in crop production, change in annual income, change in household possession, change in food habit , change in clothing pattern, change in savings and expenditures were highly significant at 0.01 level of probability. This result gives indication that, these seven aspects were increased /improved after adoption of villages by KVKs. The probable reason for increase in use of improved varieties might be its easy availability at university and Gurabini. Moreover, due to different project like NICRA, NMOOP and NFSM varieties like GG-5, GJG-3, GJG-22, GJP-1,Vaishali , GT-3, GT-4,GCH-7,GCH-9, GW-366 and GW496 and GW-173 very popular among the farmers because regular field day conducted by KVK Amreli and this varieties have own potentiality to gives high returns to the respondents. Crop production increased might be due to the adoption of crop production technology and regular suggestion adopted from KVK scientist. The annual income was increased due to more farm production and decrease in crop production crop. It was also due to majority of the respondents have occupation were animal husbandry and farming.

The improvement found in household possession, food habit and clothing pattern might be due to that the respondents have increased their annual income of respondent and also influence of mass media in the society.

The improvement found in savings and expenditures might be due to that the farmers have awareness about economic security and now governments gives all their benefits to farming community directly on their account.

Changes in area under field crops were significant at 0.01 level of probability. The improvement found in area under field crop might be due to the respondents have started intercropping specially grown pulse crops in area because of influence of CFLDs under NFSM.

The findings lead to conclude that positive and effective impact occurred in adopted villages due to large scale activities likes training, diagnostic visit, and FLDs given by KVK, Amreli. Thus, KVK played an important role in accelerating agricultural production and affecting a positive change in daily routine life of farmers.

Table 6: Distribution of respondents according to their constraints n=200

SN	Constraints	F	%	Rank
1	Don't provide improved seed materials	97	48.50	VII
2	Suggest technology unavailable at local market	69	34.50	VIII
3	Limited veterinary service	120	60.50	V
4	Only focused on university technology	147	73.50	III
5	Limited information regarding market	164	82.00	I
6	Less number of village training	103	51.50	VI
7	No any kind of exposure visit	152	76.50	II
8	Don't provide transport facility in on campus training	138	69.00	IV

Table 6 shows that major constraints faced by respondents were limited information regarding market (82.00 percent) and first rank followed by no any kind of exposure visit (76.50 percent), Only focused on university technology (73.50 percent), Don't provide transport facility in on campus training (69.00 percent), Limited veterinary service (60.50 percent), Less number of village training (51.50 percent), Don't provide improved seed materials (48.50 percent) and Suggest technology unavailable at local market (34.50 percent) were ranked II,III,IV,V,VI,VII and VIII.

The data presented in Table 7 indicated that major suggestions given by respondents were market information and analysis provided to farmers (83.00 percent) and ranked first followed by transport facility provided to the farmers (76.00 percent), government providing set up for availability of technology at cheaper rate in KVK (71.00 percent), Providing veterinary service (61.00 percent), exposure visit should be arranged(60.00 percent), increase village training (47.50 percent), Improve seed should be available (46.00 percent) were ranked II,III,IV,V,VI and VII.

Table 7: Distribution of respondents according to their suggestions n=200

Sr. No.	Suggestion	F	%	Rank
1	Improve seed should be available	92	46.00	VII
2	Providing veterinary service	122	61.00	IV
3	Transport facility provided to the farmers	152	76.00	II
4	Market information and analysis provided to farmers	166	83.00	I
5	Government providing set up for availability of technology at cheaper rate in KVK	142	71.00	III
6	Increase village training	95	47.50	VI
7	Exposure visit should be arranged	120	60.00	V

Conclusion

From above study it can be concluded that major image made activities done by KVK were KVK provides knowledge on need based application of fertilizer and pesticides which help farmers to save expenditure on fertilizers and pesticides and ranked first followed by KVK personnel, explains the importance of technology in local language through which communication barriers can be avoided, KVK organizes field days to communicate the innovations to the potential users , KVK conducts Front Line Demonstration to demonstrate the production potentiality of various crops under the farmer's condition and resources and the major factor influence image of KVK were farming experience, mass media exposure ,education and innovativeness. In case of impact effective changes occurred in all eight aspect for impact analysis.

Moreover, major constraints faced by respondents were limited information regarding market, no any kind of exposure visit, Only focused on university technology , Don't provide transport facility in on campus training, limited veterinary service and major suggestions given by respondents were market information and analysis provided to farmers and ranked first followed by transport facility provided to the farmers, government providing set up for availability of technology at cheaper rate in KVK, Providing veterinary service.

14. Kisan Mobile Advisory Services: NIL

15. PERFORMANCE OF INFRASTRUCTURE IN KVK

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

Sl. No.	Demo Unit	Year of establishment	Area (ha)	Details of production			Amount (Rs.)		Remarks
				Variety	Produce	Qty.	Cost of inputs	Gross income	
1.	Herbal Garden	May-2007	0.5	40	-	-	-	-	Demonstration purpose
2.	Orchard Unit	2008	0.5	62	-	-	-	-	

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

Name of the crop	Date of sowing	Date of harvest	Area (ha)	Details of production			Amount (Rs.)	
				Variety	Type of Produce	Qty. (kg)	Cost of inputs	Gross income
Cereals								
Wheat	22/11/2021	17-20/03/2022	1.0	GJW-463	Truthful	5960	50,000/-	2,17,100/-
Pulses								
Chickpea	29/11/2021	14-16/03/2022	1.0	GJG-5	Truthful	1580	60,000/-	90,193/-
Oilseeds								
Groundnut	01/07/2022	28-29/10/2022	3.0	GJG-22	Foundation-I	2530	1,35,000/-	1,65,000/-
Groundnut	02/07/2022	30-31/10/2022	3.5	GJG-22	Truthful	1980	1,57,500/-	1,92,500/-
Groundnut	03/07/2022	1-2/11/2022	3.0	GJG-32	Truthful	4170	1,35,000/-	1,65,000/-
Sesame	18/07/2022	6-8/10/2022	1.5	GJT-5	Breeder	705	52,500/-	75,000/-

C. Performance of production Units (bio-agents / bio pesticides/ bio fertilizers etc.): NIL

D. Performance of instructional farm (livestock and fisheries production): NIL

E. Utilization of hostel facilities: NIL

F. Database management

S. No	Database target	Database created
1	**-**	**5731**

G. Details on Rain Water Harvesting Structure and micro-irrigation system

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 Demonstrations	No. of plant materials produced	Visit by farmers (No.)	Visit by officials (No.)		
--	-	-	6	11	-	171	-	-	-

H. Performance of Nutritional Garden at KVK farm. If Nutritional Garden developed at KVK farm/Village Level?: No

I . Details of Skill Development Trainings organized: NIL

17. FINANCIAL PERFORMANCE

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	State Bank of India	Agril campus, Junagadh	-	-	-	-	-
With KVK		Amreli (Current A/C) Amreli (Saving A/C)	0312	KVK Fund A/c	10837874780 10837877690	365002601	SBIN0000312

B. Utilization of KVK funds during the year 2022-23 (Rs. in lakh)(Till Dec, 2022)

Sr. No.	Particulars	Sanctioned	Released	Expenditure
A. Recurring Contingencies				
1	Pay & Allowances	10600000	9611000	7806734
2	Traveling allowance	55000	606000	50879
3	Contingencies	775000		605988
	Total (A)	**11430000**	**10217000**	**8463601**
B. Non-Recurring Contingencies				
1	Equipments including SWTL & Furniture/Vehicle/Library	0	0	0
	Total (B)	**0**	**0**	**0**
C.	**Revolving fund**	0	0	0
	GRAND TOTAL (A+B+C)	**11430000**	**10217000**	**8463601**

C. Status of revolving fund (Rs. in lakh) for the Four years

Year	Opening balance as on 1st April	Income during the year	Expenditure during the year	Net balance in hand as on 1st April of each year
April 2018 to March 2019	44,32,715	19,93,508	10,04,278	54,42,575
April 2019 to March 2020	54,42,575	21,30,032	19,80,100	55,92,507
April 2020 to March2021	55,92,507	11,59,196	1,01,4207	57,37,496
April 2021 to March, 2022	57,37,496	11,55,326	13,41,859	55,50,963
April 2022 to March 2023	55,50,963	18,55,640	17,81,749	56,24,854

18. Details of HRD activities attended by KVK staff during year

Name of the staff	Designation	Title of the training programme	Institute where attended	Mode (Online/ Offline)	Dates
Dr. N.S Joshi	Senior Scientist and Head	National conference of KVK	Dr. Y.S Parmar University of horticulture and forestry	Offline	01/06/2022 to 02/06/2022 (2 days)
		National level seminar: Synergetic Extension Approaches for Livelihood Improvement and Agricultural Development	JAU, Junagadh	Offline	24/06/2022 to 25/06/2022 (2 Days)
		Annual Zonal workshop of KVK of Maharashtra, Gujarat and Goa	AAU, Anand	Offline	07/07/2022 to 09/07/2022 (2 Days)
Dr. P. S. Jayswal	SMS (Agril. Engg.)	Faculty development programme for Extension Functionary	DEE, JAU, Junagadh	Online	03-05/02/2022 (3 days)
		The state level webinar on "પ્રાકૃતિક કૃષિમાં પાક સંરક્ષણ"	Plant protection association of Gujarat, Anand zone, Gujarat Organic Agricultural University, Anand and Centre for Agricultural Market intelligence, NAHEP-CAAST, AAU, Anand	Online	05/04/2022 (1 day)
		Success story writing skills for print & electronic media	EEI, AAU, Anand & DEE, JAU, Junagadh	Offline	08-10/06/2022 (3 days)

		National level seminar: Synergetic Extension Approaches for Livelihood Improvement and Agricultural Development	SEEG & JAU, Junagadh	Offline	24-25/06/2022 (2 days)
		National level seminar: Innovative Resource Management Approaches for Coastal and Inland Ecosystems to Sustain Productivity and Climate Resilience	SCSI, India & NAU, Navsari	Offline	13-15/10/2022 (3 days)
Dr. Neha Tiwari	SMS (Home Science)	Faculty development programme for Extension Functionary	DEE, JAU, Junagadh	Online	03-05/02/2022 (3 days)
		Success Story writing for print media and electronic media (Three Days Training Programme)	EEI, AAU, Anand	Offline at JAU, Junagadh	8/06/2022 to 10/06/2022 (3 days)
		National level seminar: Synergetic Extension Approaches for Livelihood Improvement and Agricultural Development	SEEG, JAU, Junagadh	Offline at JAU, Junagadh	24/06/2022 to 25/06/2022 (2 days)
		Use of social media for extension (Five Days Training Programme)	EEI, AAU, Anand	Offline at JAU, Junagadh	10/10/2022 to 14/10/2022 (5 days)

		National workshop on Natural Farming	RKSKVV, Gwalior	Offline at Gwalior	03/12/2022 (1day)
Mr. N.M.Kachhadiya	Scientist (Plat Protection)	Writing skill for print and electronic media	JAU, Junagadh	Offline	08/06/2022 to 10/06/2022 (3 days)
		National level seminar: Synergetic Extension Approaches for Livelihood Improvement and Agricultural Development	JAU, Junagadh	Offline	24/06/2022 to25/06/2022 (2 days)
Dr. P. J. Prajapati	Scientist (Agronomy Scientist)	Workshop for entry of DFI stories	ATARI, Pune	Offline	21-22/05/2022 (2 Days)
		National level seminar: Synergetic Extension Approaches for Livelihood Improvement and Agricultural Development	JAU, Junagadh	Offline	24-25/06/2022 (2 Days)
		Yaugik Krishi	Brahmakumaris, Shantivan, Abu Road, Rajasthan	Offline	17-21/09/2022 (5 Days)
		Natural Farming for Sustainable Agriculture and National Prosperity	SDAU, Dantiwada	Offline	11-13/11/2022 (3 Days)
		Natural Farming Training	Gurukul, Kurukshetra, Haryana, India	Offline	08-09/12/2022 (2 Days)
Mr. V. S. Parmar	Scientist (Agricultural extension)	National level seminar: Synergetic Extension Approaches for Livelihood Improvement and Agricultural Development	JAU, Junagadh	Offline	24-25/06/2022 (2 Days)

18. Details of progress in Doubling Farmers Income (DFI) villages adopted by KVKs

Name of the village	Total No. of families surveyed	Key interventions implemented	No. of farmers covered in each intervention	Change in income (Rs/unit)	
				Before (base year)	After (current year)
Karjala	25	Organic farming, custom hiring center, improved varities, value addition	20	1,00,000/-	1,50,000/-
Nesdi	25		20	98,000/-	1,35,000/-

19. Details of activities planned under NARI /PKVY / TSP / KKA, etc.: NIL

20. Details of Progress of ARYA Project

I. Enterprise established:

Sr. No.	Indicators	Name of Enterprise 1: Dal mill (02)	Name of Enterprise 2: Masala making (02)	Name of Enterprise 3: Mava making (02)
1.	Year of establishment	Feb., 2022	Feb., 2022	Feb., 2022
2.	No. of Training Programs Conducted (Number)	04	03	03
3.	No. of Rural youth trained (Number)	161	481	115

II. Training programme:-

Sr. No.	Title	No. participate
1.	Awareness training on ARYA	150
2.	Value addition of milk	25
3.	Marketing opportunity for value added product of spices	37
4.	Value addition of milk	39
5.	Value addition of pulse crop	36
6.	Value addition of spices crop and their marketing strategy	294
7.	Packaging and marketing of value added agricultural product	46
8.	Women development through value addition of millets	55
9.	Preparation of bakery product	24
10.	Value addition of pulse crop and clean milk production	51
	Total	**757**

III. Extension activity:-

Sr. No.	Activity	
1.	**Visit to enterprise**	**No. participate**
	11	92

2.	Folder preparation	Total copy
1.	મોસમી ફળો દ્વારા તૈયાર થતી આરોગયપ્રદ અને પોષ્ટિક વાનગીઓ	1000

21. Details of SAP

- During October 02 to 15, 2022 and 16 December to 31 December Swacchta Hi Sewa Programme was organized by KVK, Amreli by organize different activities of swacchta.

S. No.	Date	Activities (02 October to 15 October, 2022)	No. of Participants
1.	4.10.2023	Awareness programme on swacchta hi sewa	36
2.	06.10.2023	Cleaning of surrounding areas of KVK	14
3.	10.10.2022	Cleaning at village level	52
4.	11.10.2022	Tree plantation	15

S. No.	Date	Activities (16 December to 31 December, 2022)	No. of Participants
1	16.12.2022	Display of banner at prominent places, taking Swachhata pledge, Stock taking & briefing of the activities to be organized during the Pakhwada, plantation of trees.	16
2	17.12.2022	Basic maintenance: Stock taking on digitization of office records/ e-office implementation. Cleanliness drive including cleaning of offices, corridors and premises. Review of progress on weeding out old records, disposing of old and obsolete furniture's, junk materials and white washing/painting.	38
3	18.12.2022	Sanitation and SWM Encourage cost effective and appropriate technologies for ecologically safe and sustainable sanitation. Cleanliness and sanitation drive in the villages adopted under the MeraGaonMera Gaurav Programme and/or other schemes by ICAR Institutes/KVKs involving village community. Reviewing the progress made under ongoing Swachhtaactivities including implementation of Swachhta Action Plan (SAP) & providing at the spot solutions.	20
4	20.12.2022	Stock taking of waste management & other activities including utilization of organic wastes/ generation of wealth from waste, polythene free status, composting of kitchen and home waste materials. Promoting clean & green technologies and organic farming practices in kitchen gardens of residential colonies andat least one nearby village and proving on the spot technology solutions.	53
5	22.12.2022	Organising Workshops, exhibitions, technology demonstrations on agricultural technologies for conversion of waste to wealth, safe disposal of all kinds of wastes. Debate on Swachhata at the DARE/ICAR establishments, Seminars, awareness camps, rallies, street plays and expert talks	28

6	23.12.2022	Celebration of Special Day- KisanDiwas (Farmer's Day)-23 December inviting farmers. Experience sharing on Swachhata initiatives by farmers and civil society officials. Felicitating farmers/ civil society officials for exemplary initiatives on Swachhata.	55
7	26.12.2022	Fostering healthy competition: Organising Webinar, VC meetings, competition and rewarding best offices/ residential areas/ campuses on cleanliness. Quiz, assay & drawing competitions for school children, village youth.	25
8	27.12.2022	Massive community mobilization for Plastic Waste Shramdaan: Awareness on waste management & other activities including utilization of organic wastes/ generation of wealth from waste, polythene free status. Curb the use of Single Use plastic (SUP) and discourage the use of plastic in the office. Composting of kitchen and home waste materials, promoting clean & green technologies and organic farming practices in new area.	300
9	29.12.2022	Visits of community waste disposal sites/ compost pits, cleaning and creating awareness on treatment & safe disposal of bio-degradable/ non-bio-degradable wastes by involving civil/ farming community.	85

22.1 Agriculture Technology Information Centre Activities (ATIC):

I. Trainings/Ext. activities:

Sr. No.	Types of training/Ext. activities	No. of Training/Ext. activities	No. of participants
1	On Campus	5	228
2	Off Campus	10	447
3	Field day/ Field visit	21	285
	Total	**36**	**1052**

II. FRONT LINE DEMONSTRATIONS:

Sr. No.	Crop	Season	Component /Variety	No. of FLD	Area (ha)	Average yield (q/ha)		% increase in productivity over local check
						Demo	Local check	
1	Groundnut	Kharif 22	IPM (Metarhizium, Beauveria, Azadirechtinchloro pyriphos	20	5	28.2	26.0	8.16
2	Cotton		IPM (Cotton Inputs Beauveria, Azadirechtin, Pheromone trap)	20	5	26.4	23.9	10.23
3	Groundnut		GJG-32	20	5	31.4	27.7	13.36
4	Sesame		GT-6	10	4	7.9	6.5	21.15
5	Cotton		MDT tube	10	2.5	26.13	22.19	17.75
6	Wheat	Rabi 2021-22	GW-451	24	6	56.0	51.8	8.15
7	Chickpea		GJG-6	25	6.25	34.95	32.90	6.23
8	Chickpea		GG-3	25	6.25	33.9	30.1	12.65
9	Onion		lalpati	10	2.5	346.9	295.6	17.34
			Total	**164**	**42.50**			

III. Economic Impact of FLDs:

Crop	Average Cost of cultivation (Rs./ha)		Average Gross Return (Rs./ha)		Average Net Return (Profit) (Rs./ha)		Cost Ratio (Gross Return / Gross Cost)	
	Demo	Local Check	Demo	Local Check	Demo	Local Check	Demo	Local Check
Groundnut	35330.2	37387.1	166345.7	153721.4	131015.5	116334.3	4.71	4.11
Cotton	42336.9	44556.6	230356.0	203858.9	188019.2	159302.3	5.44	4.57
Groundnut	35118.9	36587.4	182721.9	161239.6	147603.1	124652.2	5.20	4.42
Sesame	14324.1	14777.3	112437.5	92703.1	98113.4	77925.8	7.83	6.28
Cotton	40454	43536	226850	188156	186396	144620	5.61	4.32
Wheat	25536.3	26446.3	98420.6	91007.8	72884.3	64561.5625	3.85	3.44
Chickpea	23522	24432	161808	150653	138285.5	126220.5	6.87	6.16
Chickpea	23150.8	24060.4	157990.0	140262.5	134839.2	116202.1	6.82	5.82
Onion	97205.0	98640.0	254984.4	217125.0	157779.3	118485	2.62	2.20

22.2. Activities-Cluster base Front Line Demos. of Rabi and Summer Pulses under NFSM:

I. Trainings/Ext. activities:

Sr. No.	Types of training	No. of training	No. of participants
1	On campus	03	80
2	Off campus	05	177
3	Field day	07	132
4	Field visit	18	127
5	Sponsored training	03	95
	Total	**36**	**611**

II. Cluster Front Line Demonstrations of Rabi Pulses under NFSM:

Sr. No.	Crop	Season	Component /Variety	No. of FLD	Area (ha)	Average yield (q/ha)		% increase in productivity over local check
						Demo	Local check	
1	Pigeon pea	Kharif 2021-22	GJP-1, Trichoderma, Rhizobium, Beuvaria, PSB	50	20	19.60	16.74	17.08
2	Gram	Rabi-2021-22	GJG-6, Trichoderma, HNPV, Beuvaria, pheromen trap	50	20	33.99	28.7	18.62
			Total	**100**	**40**			

22.3. NATIONAL MISSION ON OILSEEDS AND OIL PALM (NMOOP)

I. Training/Ext. activities

Sr. No.	Types of training/Ext. activities	No. of training/Ext. activities	No. of participants
1	On campus	02	75
2	Off campus	02	74
3	Field visit	08	158
	Total	**12**	**307**

II. CLUSTER FRONT LINE DEMONSTRATIONS OF OILSEED UNDER NMOOP:

Sr. No.	Crop	Season	Component /Variety	No. of FLD	Area (ha)	Average yield (q/ha)		% increase in productivity over local check
						Demo	Local heck	
1	Groundnut	Kharif 22	GJG-32 ,Metarhizium, Rhizobium and PSB	50	20	30.9	28.5	8.15
Total				**50**	**20**			

III. Economic Impact of CFLDs (NMOOP)

Crop	Average Cost of cultivation (Rs./ha)		Average Gross Return (Rs./ha)		Average Net Return (Profit) (Rs./ha)		Cost Ratio (Gross Return / Gross Cost)	
	Demo	Local Check	Demo	Local Check	Demo	Local Check	Demo	Local Check
Groundnut	35791.2	37462.4	179784.4	166508.8	143993.1	129046.4	5.02	4.45

22.4 Insecticide Resistance Management (IRM): Dissemination of Pink bollworm management strategies

I. Trainings/Ext. activities

Sr. No.	Types of training	No. of Training	No. of participants
1	Off Campus	1	85
2	Field days	2	25
Total		**3**	**110**

II. Critical input distributed

Sr. No.	Critical input distributed	Quantity
1	Pheromone traps	50 nos.
2	Neem based insecticides (Neem seed extract, Neem oil)	15 lit
3	Flonicamid 50 WG	150gm*10
4	Trichocards (Parasitoid Trichogrammabactrae)	300 card
5	Profenophos 50%EC	10 lit

A) Report on sucking pests (jassid, thrips, whitefly and aphid) infestation incotton in the season based on observation in 10 fields of IRM and Non-IRM

No. of Farmer (IRM)-10 (village- chital) No. of Farmer (Non IRM) -2

SMW	Sucking pests/leaves/plant							
	IRM				Non-IRM			
	Jassid	Whitefly	Thrips	Aphid	Jassid	Whitefly	Thrips	Aphid
27	0.00	0.00	0.00	0.00	1.20	0.00	6.40	0.00
28	0.00	0.00	0.00	0.00	1.80	0.00	8.60	0.00
29	1.00	1.00	3.00	0.00	2.20	3.40	9.00	0.00

30	2.00	0.00	5.00	0.00	3.00	4.80	10.20	0.00
31	1.60	1.20	3.80	0.00	4.50	8.10	9.50	0.00
32	1.70	2.10	4.50	0.00	4.80	7.10	10.70	0.00
33	1.90	1.80	3.20	0.00	4.20	6.80	9.90	0.00
34	2.10	1.30	3.30	0.00	5.10	9.80	9.60	0.80
35	3.50	1.20	2.10	0.60	8.90	4.50	9.50	1.60
36	4.70	1.50	3.10	1.40	8.50	4.70	9.90	2.80
37	4.80	1.70	3.15	1.60	7.80	5.40	6.80	2.00
38	4.20	1.80	3.40	2.00	7.60	5.20	5.60	3.20
39	3.90	2.20	2.50	2.40	8.00	4.90	7.90	3.80
40	5.00	1.90	3.50	3.00	8.50	4.80	7.00	3.00
41	5.50	1.60	3.25	3.60	9.00	4.90	6.90	4.80
42	4.50	2.00	3.90	2.80	8.00	5.00	6.20	5.20
43	2.50	3.20	1.10	4.20	5.90	5.50	5.40	5.80
44	3.50	4.20	2.20	4.60	4.50	6.70	5.80	6.40
45	2.80	3.70	2.50	5.00	6.70	6.40	4.90	6.80
46	2.20	1.80	2.60	5.80	7.80	7.20	6.80	7.00
47	1.10	4.60	0.20	6.20	2.00	7.00	1.00	9.60
48	0.50	4.90	0.50	7.80	1.50	7.80	1.20	10.80
49	0.90	5.60	0.30	8.20	1.20	8.00	1.30	12.40
50	1.00	6.00	0.80	10.80	1.30	8.50	1.50	13.80
51	2.20	4.20	1.20	8.80	4.20	6.80	2.60	10.60
52	2.60	3.80	1.60	9.10	4.38	6.45	2.95	12.20
Avg.	2.53	2.43	2.33	3.38	5.10	5.76	6.43	4.72

SMW=Standard Meteorological Week

B) Report on Pink boll worm infestation in cotton in the season based on observation in selected 10 fields of IRM and Non-IRM.

No. of Farmer (IRM)-10 (village- chital) No. of Farmer (Non IRM)-2

SMW	**Pink boll worm infestation (Samplingof20flowers/green bolls/open bolls per acre)**									
	IRM					**Non-RM**				
	% Flower infestation	**% Green boll infestation**	**% Locule damage**	**% Open boll infestation**	**Av. Pheromone trap catches (No.) Per Trap/week**	**% Flower infestation**	**% Green boll infestation**	**% Locule damage**	**% open boll infestation**	**Av. Pheromone trap catches (No.) per Trap/week**
27	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
28	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
29	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
30	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
31	2.45	0.00	0.00	0.00	0.00	4.20	0.00	0.00	0.00	0.00
32	1.90	0.00	0.00	0.00	0.00	4.50	0.00	0.00	0.00	0.00

33	1.50	0.00	0.00	0.00	0.00	3.20	0.00	0.00	0.00	0.00
34	1.60	0.00	0.00	0.00	0.00	3.20	0.00	0.00	0.00	0.00
35	1.45	1.20	1.10	0.00	5.00	3.40	2.25	1.50	0.00	7.00
36	2.10	1.30	1.05	0.00	6.00	3.50	2.35	1.60	0.00	7.00
37	2.30	1.50	1.05	0.00	8.00	3.40	2.60	1.80	0.00	8.00
38	1.35	1.45	1.15	0.00	6.00	3.40	2.35	1.90	0.00	6.00
39	2.45	2.50	2.10	2.15	6.00	4.40	4.50	2.15	3.00	8.00
40	2.15	2.30	2.05	2.18	7.00	4.54	5.35	2.60	3.90	7.00
41	3.30	3.50	2.00	2.90	8.00	4.90	6.60	2.80	3.70	9.00
42	3.35	3.45	1.90	3.00	6.00	5.00	6.35	3.00	5.00	10.00
43	9.40	6.50	10.10	5.40	7.80	20.2	18.2	20.2	15.2	17.5
44	8.80	7.80	8.50	5.80	6.00	19.8	15.5	18.4	16.5	15.6
45	7.20	6.10	8.80	7.50	8.00	18.8	14.2	16.5	17.5	14.5
46	6.80	6.20	7.50	6.50	6.00	12.7	10.2	18.8	14.2	14.6
47	1.40	1.50	4.00	4.15	1.00	2.10	2.50	7.15	8.00	3.10
48	1.15	1.80	4.50	5.18	1.50	2.50	3.35	7.60	7.90	4.40
49	1.30	1.90	4.90	5.10	1.90	2.90	3.60	7.80	8.30	4.70
50	1.50	1.95	4.90	5.50	2.00	3.00	3.35	8.50	8.50	5.00
51	0.00	2.50	2.50	2.50	4.20	0.00	3.60	3.70	3.20	6.20
52	0.00	3.20	2.90	1.80	4.70	0.00	3.90	3.90	3.80	5.80
Avg.	2.44	2.18	2.73	2.29	3.66	4.99	4.26	5.00	4.57	5.90

SMW=Standard Meteorological Week

- **Impact of IRM on the Benefit Cost ratio**

Field No. or farmer wise	**Cost of spray (Rs/ha)***		**Cost of cultivation (Rs/ha)**		**Net profit(Rs/ha)**		**Additional profit due to IRM (Rs/ha)**	**Benefit Cost Ratio**
	IRM	**Non-IRM**	**IRM**	**Non-IRM**	**IRM**	**Non-IRM**		
1	6520	7704	60129	70596	136621	106654	29967	2.27
2	6190	7542	60431	71125	132319	102437	29882	2.18
3	6190		60378		127622			
4	6028		60198		133706			
5	6190		61398		123202			
6	6028		62159		133441			
7	6190		63678		143338			
8	6352		62347		139653			
9	6028		60169		128831			
10	6352		61278		124597			

- **Pest infestation Report**

C) Report on Pink bollworm infestation in cotton in the season based on observation in selected 5 fields of Mating Disruption Technology treated and Non treated field

No. of Farmer (MDT Treated)-5 (Village- Haripura) No. of Farmer (Un Treated) -2

	Pink bollworm infestation (Sampling of 20 flowers/green bolls/open bolls per acre)	
	Treated	**Non-Treated**

Date	% Flower infestation	% Green boll infestation	% Open boll infestation	% Locule damage	Av. Pheromone trap catches (No.) Per Trap/week	% Flower infestation	% Green boll infestation	% Open boll infestation	% Locule damage	Av. Pheromone trap catches (No.) per Trap/week
5 Aug	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
20 Aug	0.00	0.00	0.00	0.00	0.00	1.11	0.00	0.00	0.00	2.00
5 Sep	0.00	0.00	0.00	0.00	0.00	1.09	0.00	0.00	0.00	1.50
20 Sep	1.00	0.70	1.30	1.50	5.00	3.10	2.90	2.50	3.00	9.00
5 Oct	0.50	0.60	0.80	1.00	6.00	3.10	5.00	4.00	5.90	12.00
20 Oct	1.10	1.50	1.90	1.30	7.00	3.50	3.00	5.90	5.30	13.00
5 Nov	1.50	2.60	6.00	5.00	10.00	5.30	8.50	10.00	12.00	15.00
20 Nov	2.00	3.20	6.90	5.60	12.00	5.90	5.30	9.90	8.00	16.00
5 Dec	1.40	1.80	5.20	4.50	1.50	2.90	3.00	8.50	7.50	5.50
20 Dec	1.60	2.20	5.50	4.70	1.80	3.00	3.20	8.90	7.90	4.50
5 Jan	1.30	1.20	3.30	2.20	1.00	2.00	1.20	4.00	3.10	3.00
20 Jan	1.20	1.50	2.10	2.70	1.50	2.10	2.20	3.00	2.10	2.70

22.6 Activities under MGMG:

I. Detailed Progress:

No. of Team formed	No. of Scientists	No. of Villages selected	No. of Blocks	No. of Districts	Bench Mark Survey conducted (No. of villages)
02	08	10	03	01	10

II. Activities undertaken

Activities undertaken by ICAR Institutes under MGMG

Sr. No.	Name of activity	No. of activities conducted	No. of farmers benefitted
1	Awareness created	09	577
2	Demonstrations conducted	04	10
3	Interface meeting/ *Goshthies*	02	35
4	Literature support provided	06	950
5	Training organized	01	37
6	Visit to village by teams	01	50
7	Mobile based advisories	08	835
8	Problem diagnostic	02 (General and Agriculture)	-
	Total	**33**	**2494**

III. Other activities organized by ICAR Institutes/ SAUs under MGMG

Table -2: Other activities organized by ICAR Institutes under MGMG

Sr. No.	Activity	Particulars	
1	Linkages developed with other agencies	No. of Agency (No.)	02
		Farmers Benefitted (No.)	85

22.7 District Agro-Meteorological Unit (DAMU), Gramin Krishi Mausham Seva (GKMS), KVK, JAU, Amreli (Activities from January-December 2022)

The District Agrometeorological Unit, KVK, JAU, Amreli is making Agro weather bulletin for all the 11 blocks viz. Amreli, Babra, Bagasara, Dhari, Jafrabad, Khambha, Lathi, Liliya, Kunkavav-vadiya, Rajula and Savarkundla of the Amreli district and also for the District itself.

- **Activity of DAMU at KVK Amreli**
  - Preparation of Agromet advisory bulletin Block and District wise
  - Conducting Farmer awareness program (FAP)
  - Maintaining Weather data record
  - Dissemination of weather bulletin through different social media level
- **Weather Bulletin-** Preparation of weather bulletin on the basis of medium range forecast provided by IMD supported by GFS model for the blockwiseweather bulletin. Preparation of advisory in both languages (English and Gujarati) twice in a week on every Tuesday and Friday. There are several weather parameterforecast received from IMD i.e. Rainfall, Maximum temperature, Minimum temperature, Relative humidity (maximum and minimum), Cloud cover, Wind speed and direction. The bulletin preparation is for main crops of Amreli district i.e. Cotton, Groundnut, Sesame, Wheat, Pigeon pea, Cumin, Chickpea, Castor, Sesame, Pearl millet etc.Number of Weather Bulletin prepare from **January–December2022**

District Name	**No. of Bulletins**
Amreli	104

Block name	**No. of Bulletins**
Amreli	104
Babra	104
Bagasara	104
Dhari	104
Jafrabad	104
Khambha	104
KunkavavVadiya	104
Lathi	104
Liliya	104
Rajula	104
Savarkundla	104
Total No. of Block wise Weather Bulletin	1144

- **Dissemination of weather bulletin**

Individually these bulletins are sending to farmers group by social media by making farmers WhatsApp groups, Telegram Facebook.

- **Number of farmers Connected**

Particular	**No. of farmers**
WhatsApp Group- 17	3411
Telegram Group - 1	194 Subscribers
Facebook page	2800 followers

- **Detail of farmers connected through WhatsApp**

Name of the Block	Total Village in Block	No. of WhatsApp Group Created by DAMU	No. of Farmers Covered	No. of Villages Covered	No. of Extension Workers at panchayat/village level
Amreli	71	4	951	62	10
Babra	57	2	459	51	7
Bagasara	34	2	392	31	4
Dhari	75	1	222	45	8
Jafrabad	42	1	70	21	5
Khambha	57	1	174	48	3
Kunkavav-Vadia	45	2	358	44	5
Lathi	49	1	137	30	8
Lilia	37	1	107	40	6
Rajula	72	1	165	27	4
Savarkundla	80	2	379	54	15
Total	619	18	3414	453	75

- **Farmer Awareness Programmes:**

Climate based farming is drawing farmer near to precision agriculture. So, farmer awareness is very important for cover more number can receive Agro advisories. Farmers can mitigate their crops itself against uneven weather patterns.

Sr. No.	FAP/ Farmers meet /Meghdoot Popularization activities	Date	Location		Approx. No. of Farmers attended the Program
			Village	Block	
No FAP organized due to unavailability of grant to fulfill the expenditure of FAP					

- **Attending E-Webinar during 2022: NIL**
- **Automatic Weather Station**

Installation of A.W.S. (Automatic Weather Station) has been completed in January 2021 and Working in March-2020.

22.8 Information about FPOs in the district-:

Sr. No.	Name of FPO	Working Area	No. of members
1	Dharati Raksha Agro Producer Co.	Bagasra	200
2	Jafrabad Farmer Producer Co.	Timbi	750
3	Avirat Farmer Producer Co.	Khambha	2100
4	Dhatarwadi Farmer Producer Co.	Rajula	700

23. Celebration of Special Events –

- **International Women Day**- During January to March 2022, an International Woman Day on 08/03/2022 was organized by KVK, JAU, Amreli with 52 no. of participants. The entire programme was organized as per the theme of ICAR. Awareness was created among farmwomen about various importance of the day, value addition, storage techniques and natural farming.

- **World Water Day-**World Water Daywas celebrated by Krishi Vigyan Kendra, Junagadh Agricultural University, Amreli on 22nd March, 2022. In this programme, an on campus training programme for farmers was organized in which 50 farmers had participated. Awareness was created about efficient water use in agriculture; rainwater harvesting and groundwater recharge structure was demonstrated.
- **The Garib Kalyan Sammelanprogramme** was celebrated by Krishi Vigyan Kendra, Junagadh Agricultural University, Amreli on 31/05/2022. In this programme, an on campus programme for farmers and farmwomen was organized in which more than 235 persons had participated. Awareness was created among farmers and farmwomen about various importance of the various government scheme, value addition, storage techniques and natural farming. Farmers doing natural farming shared their valuable experience with other participants.
- **National Environment Day** was celebrated on 5th June 2022 by organizing tree plantation programme at village Keriya Ta. Lathi Dist. Amreli. In this day lecture on importance of tree plantation in our life was also delivered by KVK, scientist for 35 participants.
- **International Yoga Day**was celebratedon 21st June 2022 by all the staff members of KVK, looking forward the guideline issued by the Government of India, all the members do yoga and lecture on importance of yoga in our life was also organized for 79 participants.
- **ICAR Foundation Day**was celebrated on 16 July 2022, 94th ICAR foundation day was celebrated by KVK, Amreli as per the information given by ATARI Pune Zone VIII. In this programme Hon'ble Union Agriculture Minister released compilation of 75,000 success stories on doubling the farmer income and award was also given to farmers and scientist. In KVK, Amreli 74 farmers and 24 farm women take a active part to make the programme successful. Entire event was online and watched by all the participants and staff of KVK, Amreli.
- **Parthenium Awareness Week at Krishi Vigyan Kendra, JAU, Amreli, Gujarat-** From 16 august to 22 August-2022. As it is known to everyone that directorate is observing 'Parthenium Awareness week' every year since 2004 to make farmers and general public aware about the menace of parthenium, so like every year this year KVK, Amreli, Junagadh Agricultural University also celebrated 17th Parthenium Awareness Week by uprooting parthenium to make campus free from it as well as lecture were also planned and delivered by scientist of KVK to make general awareness regarding Parthenium. Uprooting of Parthenium was done within the campus and outside of campus so that general public might aware from the activities.
- **Details of Parthenium Awareness Week-:**

Date	Name of Activity	Location	No. of Participants
16/08/2022	Parthenium uprooting in public place	Amreli	44
20/08/2022	Training programme organized on spraying herbicides and composting of uprooted	KVK, Amreli	48

	biomass		
21/08/2022	Parthenium uprooting in campus	KVK, Amreli	20
22/08/2022	Training programme on releasing Mexican beetles and Parthenium uprooting	KVK, Amreli	50

- **National Campaign on Poshan Abhiyan-** On 17/09/2022 "National Campaign on Poshan Abhiyan and Tree Plantation was organized at KVK, Amreli for 77 farmers and farm women. During the event lecture on awareness on Nutri-garden and bio-fortified varieties and interaction on Nutri-cereals and their role on human health were delivered by KVK scientist and also saplings of fruit/agro-forestry trees and seed packets of vegetables were distributed among beneficiaries. During the same programme Hon'ble Union Minister for Agriculture & Farmers' Welfare, Government of India addressed the farmers from KVK, Morena, Madhya Pradesh.
- **PM Kisan Sanman Samelan**- During Month of October on 17/10/2022 PM KisanSanmanSamelan was also organized by the KVK, Amreli. For this programme 05 progressive farmers had visited PUSA Institute Delhi to have interaction with PM Shri Narendra Modi Sir and during same day on campus programme was also organized at KVK Amreli to had online interaction with PM Sir with no. of participants' 245.
- **Mahila Kisan Divas**- On 15/10/2022 MahilaKisan Divas was organized for 130 partcipents during the programme different lecture was also organized on same progarmme.
- **World Soil Health Day** - On 05/12/2022 World Soil Health Day was also organized for 72 farmers and farm women. During the event various information were given by the scientist on topics like soil health card, importance of different kind of soil etc.
- **Jal Shakti Abhiyan:** Jal Shakti Abhiyan was celebrated by KVK, JAU, Amreli from April to November 2022. Various online, on campus and off training programmes and various awareness programmes were organized about efficient water utilization in agriculture, micro irrigation system, rainwater harvesting, soil and water conservation, groundwater recharge etc.

Training Programs		**Awareness Programs**		**Kisan Mela**	
Number	**Participants**	**Number**	**Participants**	**Number**	**Participants**
6	171	13	584	1	227

APR SUMMARY

1. Training Programmes

Clientele	No. of Courses	Male	Female	Total participants
Farmers & farm women	92	2738	1850	4588
Rural youths	9	229	269	498
Extension functionaries	2	44	50	94
Sponsored Training	16	450	433	883
Vocational Training	1	10	55	65
Total	**120**	**3471**	**2657**	**6128**

2. Frontline demonstrations

Crops/Enterprise	No. of Farmers	Area(ha)	Units/Animals
Oilseeds	20	8	
Pulses	20	8	
Cereals	-	-	
Vegetables	10	4	
Other crops	20	8	
Hybrid crops	10	4	
Total	**80**	**32**	
Livestock & Fisheries	-	-	
Other enterprises	110	15	
Total	**110**	**15**	
Grand Total	**190**	**47**	

3. Technology Assessment & Refinement

Category	No. of Technology Assessed & Refined	No. of Trials	No. of Farmers
Technology Assessed			
Crops	3	9	9
Livestock	-	-	-
Various enterprises	3	18	18
Total	**6**	**27**	**27**
Technology Refined			
Crops	-	-	-
Livestock	-	-	-
Various enterprises	-	-	-
Total	-	-	-
Grand Total	**6**	**27**	**27**

4. Extension Programmes

Category	No. of Programmes	Total Participants
Extension activities	1546	19142
Other extension activities	10	600
Total	**1556**	**19742**

5. Mobile Advisory Services: NIL

6. Seed & Planting Material Production

	Quintal/Number	Value (Rs.)
Seed (q)	169.25	-
Planting material (No.)	-	-
Bio-Products (kg)	-	-
Livestock Production (No.)	-	-
Fishery production (No.)	-	-

7. Soil, water & plant Analysis

Samples	No. of Beneficiaries	Value (Rs.)
Soil	21	6300
Water	229	18320
Plant	-	-
Total	**250**	**24620**

8. HRD and Publications

SN	Category	Number
1	Abstract	30
2	Workshops	4
3	Conferences	5
4	Meetings	0
5	Trainings for KVK officials	5
6	Visits of KVK officials	0
7	Book published	2
8	Training Manual	0
9	Book chapters	2
10	Booklet	0
11	Leaflets/ Folder/ Pamphlet	1
12	Research papers	7
13	Technical Bulletin	0
14	Popular article	3
15	Lead papers	1
16	Seminar papers	27
17	Extension folder	1
18	Proceedings	1
19	Award & recognition	6
20	On-going research projects	1
21	Other	0