**ICAR-ATARI, Pune**

**DETAILS OF ANNUAL PROGRESS REPORT OF KVKs DURING 2017-18**

**(1st April 2017 to 31st March 2018)**

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) |
| Krishi Vigyan Kendra, Y.C.M. Open University, Nashik - 422 222 | Office | FAX | [kvknashik@rediffmail.com](mailto:kvknashik@rediffmail.com) | [www.kvknashik.org](http://www.kvknashik.org)  Hits:90021 |
| (0253) 2231714, 2231715, 2230698 | (0253) 2231716, 2230698 |

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

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Address | Telephone | | E mail | Website address |
| Office | FAX |
| Yashwantrao Chavan Maharashtra Open University, Dnyangangotri,  Nashik-422 222 | (0253) 2231714, 2231715 | (0253) 2231716 | info@ycmou.ac.in | http://ycmou.digitaluniversity.ac |

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

|  |  |  |  |
| --- | --- | --- | --- |
| Name | Telephone / Contact | | |
| Mr. Raosaheb B. Patil | Office | Mobile | Email |
| (0253) 2230698 | 9403774654 | [raopatil@rediffmail.com](mailto:raopatil@rediffmail.com) |

1.4. Year of sanction: 1994

**1.5. Staff Position (as on March 31, 2018)**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  | **If Permanent, Please indicate** | |  | **If Temporary, pl. indicate the consolidated amount paid (Rs./month)** |
| **Sl.**  **No.** | **Sanctioned post** | **Name of the incumbent** | **Discipline** | **Current**  **Pay Band** | **Current Grade Pay** | **Date of joining** |
|  | Senior Scientist and Head | Mr. Raosaheb Patil | Agril. Microbiology | 31980 | 6600 | 17.03.2003 |  |
|  | Subject Matter Specialist | Mr. Rajaram Patil | Agril. Engineering | 30140 | 5400 | 01.03.1996 |  |
|  | Subject Matter Specialist | Mr. Hemraj Rajput | Horticulture | 28680 | 5400 | 16.12.1998 |  |
|  | Subject Matter Specialist | Dr. Niteen Thoke | Agril. Extension | 25010 | 5400 | 01.08.2000 |  |
|  | Subject Matter Specialist | Dr. Prakash Kadam | Agronomy | 23710 | 5400 | 10.08.2006 |  |
|  | Subject Matter Specialist | Mrs. Archana Deshmukh | Home Science | 21220 | 5400 | 05.06.2007 |  |
|  | Subject Matter Specialist | Dr. Shyam Kadus | Veterinary Science | 21220 | 5400 | 25.06.2007 |  |
|  | Programme Assistant | Mr. Mangesh Vyavahare | Agril. Chemistry | 12930 | 4200 | 01.06.2007 |  |
|  | Computer Programmer | Mr. Harshal Kale | Computer | 10130 | 4200 | 18.07.2014 |  |
|  | Farm Manager | Mr. Sandeep Bhagwat | Horticulture | 16900 | 4200 | 26.03.2003 |  |
|  | Accountant/Superint. |  |  |  | - |  |  |
|  | Stenographer | Mrs. Vanita Rodge | - | 14390 | 2700 | 01.07.1995 |  |
|  | Driver 1 | Mr. Satish Sakhare | - | 10810 | 2200 | 01.10.1998 |  |
|  | Driver 2 | Mr. Dattu Madhe | - | 8150 | 1300 | 11.08.1999 |  |
|  | Supporting staff 1 | Mr. Rakesh Nikam | - | 9550 | 2000 | 01.07.1995 |  |
|  | Supporting staff 2 | Mr.Vinod Bhadke | - | 9410 | 2000 | 01.07.1995 |  |

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

|  |  |  |
| --- | --- | --- |
| **S. No.** | **Item** | **Area (ha)** |
| 1 | Under Buildings | 00.80 |
| 2. | Under Demonstration Units | 03.20 |
| 3. | Under Crops | 0.60 |
| 4. | Horticulture | 15.00 |
| 5. | Pond | 0.40 |
| 6. | Others if any |  |

**1.7. Infrastructural Development:**

**A) Buildings**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **S.**  **No.** | **Name of building** | **Source of**  **funding** | **Stage** | | | | | |
| **Complete** | | | **Incomplete** | | |
| **Completion**  **Year** | **Plinth area (Sq.m)** | **Expenditure (Rs.)** | **Starting year** | **Plinth area**  **(Sq.m)** | **Status of construction** |
| 1. | Administrative  Building | ICAR | July 1998 | 694 | 2650758  1600575 | - | - | -- |
| 2. | Farmers Hostel | ICAR | 305 | - | - | - |
| 3. | Staff Quarters (6) | - | - | - | - | - | - | - |
| 4. | Demonstration Units (2) |  |  |  |  |  |  |  |
| 5 | Fencing | ICAR | - | - | - | - | - | - |
| 6 | Rain Water harvesting system | YCMOU | 2001  2005 | 02Ha | 1500000 | - | - | - |
| 7 | Threshing floor | YCMOU | 1998 | 200 | 35000 | - | - | - |
| 8 | Farm godown | YCMOU | 2003 | 93 | 160000 | - | - | - |
| 9 | ICT lab |  |  |  |  |  |  |  |
| 10 | Other |  |  |  |  |  |  |  |

**B) Vehicles**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Type of vehicle** | **Year of purchase** | **Cost (Rs.)** | **Total kms. Run** | **Present status** |
| Ferguson Tractor | 2009 | 538651 | 3039.01 | Good condition |
| Motor cycle (Suzuki Samurai) | 1995 | 35,850 | Not in use | Need to replace |
| Motor cycle(Suzuki RX-100) | 1995 | 35,536 | Not in use | Need to replace |
| Mahindra Jeep : Bolero | 2009 | 599951 | 198692 | Need to replace |

**C) Equipments& AV aids**

|  |  |  |  |
| --- | --- | --- | --- |
| **Name of the equipment / Implements** | **Year of purchase** | **Cost (Rs.)** | **Present status** |
| Refrigerator (2) | 1997,2005 | 27,000 | Good |
| Student Microscope (1) YCMOU | 1996 | 10,000 | Good |
| Simple Microscopes (4) YCMOU | 1997 | 2,000 | Good |
| Camera SLR with flash gun and  close up lenses (1) | 1996 | 28,000 | Good |
| Autoclave (1) YCMOU | 1998 | 15,000 | Good |
| Mixture (1) | 1996 | 1,200 | Good |
| Colour T.V. (3) | 1995,1998 | 54,980 | Good |
| Video cassette Player (1) | 1995 | 15,500 | Good |
| Radio cum Tape (1) | 1995 | 3,000 | Good |
| Public address system (1) | 1996 | 17,000 | Good |
| Speakers (2) | 1996 | 2,000 | Good |
| Microphone (2) | 1996 | 2,450 | Good |
| Peg tooth weeder/ Earthing up hoe (4) | 1997 | 1,800 | Good |
| Dry and wet bulb thermometer (1) | 1997 | 850 | Good |
| Hand refracto meter (1) | 1997 | 1,000 | Good |
| Water cooler (5) YCMOU | 1998 | 88,019 | Good |
| Fax Machine (1) | 1998 | 18,900 | Good |
| Sewing machine (2) | 1996 | 8,200 | Good |
| Gas cylinder (4) | 1996 | 3,000 | Good |
| Water heater drum (1) | 1997 | 1,000 | Good |
| Laminar flow cabinet (1) YCMOU | 2000 | 72,005 | Good |
| Micro PH meter (digital) (1) | 2005 | 13,650 | Good |
| Conductivity Meter (Digital) (1) | 2005 | 15,942 | Good |
| Digital visible spectro- photo meter (1) | 2005 | 37,847 | Good |
| Flame Photo meter (1) YCMOU | 2000 | 37,847 | Good |
| Centrifuge Machine (1) YCMOU | 2000 | 15,000 | Good |
| Trinocular Research microscope (1) YCMOU | 2000 | 31,00 | Good |
| Hot air oven (1) YCMOU | 2005 | 15,000 | Good |
| Hot plate (2) YCMOU | 2000 | 25,000 | Good |
| Muffle Furnace (1) YCMOU | 2000 | 24,000 | Good |
| Water Still (1) YCMOU YCMOU | 2000 | 20,000 | Good |
| Mechanical Flask Shaker (2) ICAR | 2000,2005 |  | Good |
| Top pan balance (Digital) (3) YCMOU | 2000,2005,2006 | 1,25,000 | Good |
| BOD incubator (1) | 2000 |  | Good |
| Laboratory accessories (1) | 2005 | 50,000 | Good |
| Video Camera (1) | 2007 | 52,800 | Good |
| Computer +printer +UPS (1) | 2006 | 73,333 | Good |
| Lap top (1) | 2006 | 51,850 | Good |
| Ribbon Blender | 2013 | 58500 | Good |
| Homogenizer | 2013 | 39375 | Good |
| Air conditioner | 2013 | 28300 | Good |
| Sealing machine | 2013 | 23500 | Good |
| Batch coder | 2013 | 3150 | Good |
| BOD incubator | 2013 | 61875 | Good |
| Chemical balance | 2013 | 20812 | Good |
| Pusa Soil Kit | 2015 | 93 | Good |
| Soil testing Kit | 2017 | 144535 | Good |

1.8. Details SAC meeting conducted in the year

|  |  |  |  |
| --- | --- | --- | --- |
| Date | Name and Designation of Participants | Salient Recommendations | Action taken |
| 25.05.2017 |  |  |  |
|  | 1. **Dr. E. Vayunandan, Vice Chancellor, YCMOU, Nashik** 2. **Shri. Sunil Wankhede**, Principal, RAMETI, Nashik 3. **Shri. Hemant Kale**, ADO, Zilla Parishad, Nashik 4. **Dr. Pramod Pachankar**, Office In charge, Grape and Onion Research Station, Pimpalgaon (B) 5. Dr. Avinash Gosawi, ARS Niphad, 6. Shri. Vijay Phule, District Silk Development Officer, Nashik 7. Shri. Nanasaheb Patil, program officer All India Radio, Nashik 8. Smt. T. Bula Elil Mati, Dy. Conservator of Forest, Nashik 9. Shri. Pramod Wankhedkar, Dy. PD, ATMA, Nashik 10. Shri. Amit Patil, Representative of PC Malegaon Dist. Nashik 11. Shri. Dnyaneshwar Santu Shinde, representative progressive farmer, Nashik 12. Smt. Vimal Jagan Aachri, representative women farmer, Nashik 13. Smt. Suwarna Dadaji Nisrad, representative women farmer, Nashik 14. Shri. Jagan Gangaram Aachri, representative farmer, Nashik 15. Shri. Hiraman Tukaram Gawit, representative Tribal farmer, Nashik 16. All Scientific & Technical staff | * Account procedure should be simplified for preparing maximum mango grafts | Prepared 65000 number of fruits grafts |
|  | * Technical expertise should be involved in establishing PHT unit at KVK | Will involve |
|  | * KVK should take seed production program in finger millet (var. Phule Nachani) | Started seed production on farmers field |
|  | * Training on Integrated farming may be given to farmers who have committed suicide. The list will be provided by Zilla Parishad, Nashik | Demanded list of participants to Zilla Parishad, Nashik |
|  | * KVK should apply for DAESI program of MANAGE, Hyderabad | KVK applied for DAESI programme. It was offered on non-grant basis. So, KVK denied it. |
|  | * Honey bee programme should be linked with Onion seed production | Honey bee keeping topic has been included in Onion seed production programme. |
|  | * KVK should supply the fodder seedling of Phule Gunwant to farmers | 5000 number of Gunawant fodder seedlings were provided to farmers. |
|  | * KVK should supply pure Osmanabadi buck to the villages for breed up gradation | Supplied 7 Goats Pure Osmanabadi bucks. |

**2. DETAILS OF DISTRICT**

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

|  |  |
| --- | --- |
| S. No | Farming system/enterprise |
| 1 | Agriculture + Horticulture |
| 2 | Horticulture + High tech Floriculture |
| 3 | Agriculture + Horticulture + Dairy |
| 4 | Agriculture + Poultry |
| 5 | Agriculture + Dairy |

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

**a) Soil type**

|  |  |  |
| --- | --- | --- |
| Sl. No. | Agro-climatic Zone | Characteristics |
|  | Ghat Zone | Annual rainfall 3000 to 5000 mm., Laterite and non laterite soils with forest cover, Undulating topography |
| 1 | Transitional Zone I | Annual rainfall 1250 to 3000 mm., Reddish brown soils of hilly slopes |
| 2 | Transitional Zone II | Annual rainfall 700 to 1240 mm., medium black soils, plain zone. |
| 3 | Scarcity Zone | Annual rainfall 500to 700 mm., coarse shallow soils, calcareous soils. |
| 4 | Ghat Zone | Annual rainfall 3000 to 5000 mm., Laterite and non laterite soils with forest cover, Undulating topography |

**b)Topography**

|  |  |  |
| --- | --- | --- |
| S. No. | Agro ecological situation | Characteristics |
| 1 | High rainfall, sloppy land, light soils | Hilly tract, Forest cover, lateritic soils |
| 2 | High rainfall, Medium soils | Undulating land, paddy, Niger, finger millet are main crops |
| 3 | Assured rainfall, Medium soils | Plain zone, Wheat, Soybean is the main crops. |
| 4 | Assured irrigation, Medium to heavy soils | Black soils, Grape and vegetable belt |
| 5 | Low rainfall, Scarcity area, Light to medium soils | Black soils, Pomegranate, maize are main crops |
| 6 | Low rainfall, un-assured rainfall, medium to heavy soils | Deep black soils, bajra, cotton are main crops |

2.3 Soil Types

|  |  |  |  |
| --- | --- | --- | --- |
| S. No | Soil type | Characteristics | Area in ha |
| 1 | Laterite and non laterite soils | Well drain, deficient in lime, PH 5-6, Low in nutrient, high leaching | 70400 |
| 2 | Reddish brown soils | Porous soils, absence in N,P,K,lime and organic matter, PH 7-7.5, low fertility status, high leaching | 496645 |
| 3 | Medium black soils | Heavy clay texture, PH 7.5-8.5, deficient in N & P, rich in K, poor aeration. | 321760 |
| 4 | Coarse shallow soils | Light texture, low clay content, PH 6-7.5, deficient in N,P,K. | 647255 |

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

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| S. No | Crop | Area (ha) | Production (MT.) | Productivity (Qt./ha) |
|  | Paddy | 817.70 | 1927.00 | 2357.06 |
|  | Sorghum kharif | 5.67 | 7.00 | 1250.00 |
|  | Pearl millet | 1211.83 | 1815.00 | 1497.80 |
|  | Finger millet | 250.47 | 195.00 | 779.61 |
|  | Maize | 2324.06 | 12625.00 | 5432.35 |
|  | Other cereals | 109.86 | 69.00 | 630.00 |
|  | Mung | 116 | 101 | 869 |
|  | Black gram | 141 | 111 | 786 |
|  | Ground nut | 268.88 | 330.00 | 1226.76 |
|  | Sesamum | 0.16 | 0.04 | 232.00 |
|  | Niger | 91.2 | 28.00 | 312.42 |
|  | Soybean | 684.79 | 1197.00 | 1748.06 |
|  | Sunflower | 0.16 | 0.00 | 0.00 |
|  | Oilseeds | 3.01 | 0.00 | 0.00 |
|  | Cotton | 463.20 | 255.00 | 549.62 |
|  | Sugar cane | 256 | 17920 | 70 |
|  | Wheat | 713 | 1248 | 1750 |
|  | Bengal gram | 426 | 405 | 950 |

Source: District agriculture department.

**2.5. Weather data (2017-18)**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Meteorological Week** | **Month/Period** | **Rainfall (mm)** | **R.D.** | **Temperature oC** | | **Humidity (%)** | |
| **Max.** | **Min.** | **AM** | **PM** |
| 22 | 28-03 June | 33.6 | 1 | 35.9 | 24 | 85 | 47 |
| 23 | 04-10 June | 50 | 3 | 33.7 | 22.6 | 89 | 60 |
| 24 | 11-17 June | 42.8 | 3 | 32.8 | 23 | 90 | 51 |
| 25 | 18-24 June | 6 | 1 | 33.0 | 23.5 | 86 | 55 |
| 26 | 25-01 July | 22.2 | 3 | 29.0 | 22.8 | 92 | 74 |
| 27 | 02-08 July | 31.0 | 3 | 28.6 | 22.9 | 90 | 75 |
| 28 | 09-15 July | 49.6 | 3 | 29.2 | 22.3 | 92 | 81 |
| 29 | 16-22 July | 63.6 | 6 | 27.1 | 22.4 | 95 | 84 |
| 30 | 23-29 July | 88.0 | 6 | 26.0 | 22.3 | 93 | 81 |
| 31 | 30-05 Aug | 17.2 | 3 | 27.7 | 21.9 | 93 | 75 |
| 32 | 06-12 Aug | 0.8 | - | 29.0 | 21.7 | 90 | 69 |
| 33 | 13-19 Aug | 18.4 | 4 | 28.4 | 21.5 | 93 | 74 |
| 34 | 20-26 Aug | 40.0 | 4 | 27.5 | 21.3 | 93 | 77 |
| 35 | 27-02 Sept | 41.8 | 5 | 27.5 | 21.7 | 96 | 76 |
| 36 | 03-09 Sep | 1.8 | - | 30.7 | 21.4 | 91 | 64 |
| 37 | 10-16 Sep | 6.2 | 1 | 32.6 | 22.7 | 88 | 63 |
| 38 | 17-23 Sep | 31.6 | 2 | 29.5 | 21.6 | 94 | 72 |
| 39 | 24-30 Sep | 0.4 | - | 32.9 | 21.4 | 87 | 52 |
| 40 | 01-07 Oct. | - | - | 33.5 | 20 | 87 | 46 |
| 41 | 08-14 Oct. | 228 | 6 | 30.6 | 21.9 | 95 | 76 |
| 42 | 15-21 Oct. | 8 | 1 | 32.4 | 19.5 | 86 | 46 |
| 43 | 22-28 Oct. | - | - | 32.4 | 15.7 | 75 | 41 |
| 44 | 29-04 Nov. | - | - | 30.9 | 12.8 | 77 | 35 |
| 45 | 05-11 Nov. | - | - | 29.2 | 12.3 | 80 | 34 |
| 46 | 12-18 Nov. | - | - | 29.4 | 11.1 | 78 | 32 |
| 47 | 19-25 Nov. | - | - | 30.3 | 14.1 | 84 | 41 |
| 48 | 26-02 Dec. | - | - | 29.6 | 10.6 | 83 | 21 |
|  | Total | 786 | - | - | - | - | - |

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

|  |  |  |  |
| --- | --- | --- | --- |
| **Category** | **Population** | **Production** | **Productivity** |
| **Cattle** | | | |
| *Crossbred* | 166097 | Milk 398612 MT | 11 lit /cow /day |
| *Indigenous* | 940989 | 04-05 lit /cow /day |
| **Buffalo** | 233023 | 06 – 10 lit /buffalo /day |
| **Sheep** |  |  |  |
| **Goats** | 803387 | Milk included already | 0.3 – 1 lit /goat/ day |
| **Pigs** | 28287 |  |  |
| *Crossbred* | 1953 | Meat 45.9405 MT | 12-18 kg / pigs |
| *Indigenous* | 26334 |
| **Rabbits** | 1643 | Meat 780 kg | 0.5 – 1 Kg / rabbit |
| **Poultry** | 3213582 | Egg 2191 lakh  Meat 420704.79 MT | - |
| *Desi* | 1259418 | 50 Eggs/ year |
| Hens |  |  |  |
| **Category** |  | Production (Q.) | Productivity |
| Fish (Reservoir) |  |  |  |

**2.7. Details of Operational area / Villages**

| **Taluka** | **Name of the block** | **Name of the village** | **Major crops & enterprises** | **Major problem identified** | **Identified Thrust Areas** |
| --- | --- | --- | --- | --- | --- |
| Niphad | Niphad | Khadak malegaon | Grape, Onion, Tomato, Soybean, Maize, G’nut, Bengal gram, Poultry | 1. Use of traditional varieties 2. Poor storage life of Onion 3. No judicious use of pesticides 4. Lack of low level mechanization | 1. Use of Improved varieties in agronomical crops 2. Improved cultivation practices to prolong storage life in Onion 3. Improved cultivation practices in quality fruit production in Grapes 4. Integrated pest management. 5. Improved farm machineries 6. Low cost protective cultivation techniques 7. Formation of groups for effective transfer of technologies (TTC’s) |
| Trimbak | Trimbak | Chirapali,,mulegaon, Chakore, Thanapada | Paddy, Niger, Fingermillet, Littlemillet, Groundnut,Mango, Chilli,Onion ,Garlic | 1. Pest and diseases in agronomical and vegetable crops 2. Unavailability of improved seed in agronomical crops 3. FMD, BQ and HS in problems in animals 4. Hemoglobin deficiency in pregnant women 5. Low yields in traditional poultry breed 6. Unbalanced diet in tribal families 7. Imbalanced use of fertilizer in finger millet, paddy & onion 8. Huge store grain losses | 1. IPM in agronomical and vegetable crops 2. Vegetable nursery management 3. Nutrition management through Kitchen gardening 4. Improving the poultry birds 5. Providing the improved seed 6. Health and hygiene in animals 7. Improving health of pregnant women. 8. Soil test based fertilizer application in finger millet, paddy & onion. 9. low cost storage bins |
| Sinnar | Sinnar | Moh,Agaskhind,Nimgaon Sinnar | Potato, gram,Soybean | 1. Use of traditional varieties 2. Non judicious use of pesticides 3. Lack of low level mechanization 4. Low yields in traditional birds 5. FMD, BQ and HS in problems in animals 6. Unbalanced diet in tribal families | 1. Use of Improved varieties in agronomical crops 2. Improved farm machineries 3. Low cost protective cultivation techniques 4. Formation of groups for effective transfer of technologies (TTC’s) 5. Nutrition management through Kitchen gardening 6. Improving the poultry birds 7. Health and hygiene in animals |
| Nashik | Nashik | Sarul | Garlic, Nursery Management, Paddy, Groundnut , Value Addition | 1. Use of local variety in Garlic 2. High cost of groundnut crop related operation 3. Low price realization in Rice milling 4. Lack of entrepreneurship in vegetable nursery & Value addition. | 1. Use of Improved varieties in Garlic. 2. Improved farm machineries in Groundnut & Paddy processing. 3. Skill development in nursery & Value addition of fruit & vegetable. |
| Peth | Peth | Kayre, Sadarpada, Zari | Backyard poultry, Goatary, mango & cashew nut | 1. Lack of pruning in mango & cashew nut 2. Low productivity of poultry birds & goats due to local breeds 3. Lack of alternative crop in lean season | 1. Skill development pruning in mango & cashew nut 2. Introducing improved breeds of Backyard poultry & goat 3. Plantation of mango & Cashew nut on non cultivated cultivable lands. |

**2.8. Priority thrust areas:**

|  |  |
| --- | --- |
| Crop/Enterprise | Thrust area |
| Oilseed and Pulses | Improving the yield of oilseed, pulses by introducing the improved variety |
| Field Crops | Use of Improved cultivation practices in agronomical crops |
| Field Crops | Soil test based fertilizer recommendation |
| Field Crops | Integrated nutrient management |
| Field Crops | Use of bio-fertilizers for improved crop performance |
| Grapes | Improved cultivation practices in quality fruit production in Grapes |
| Onion | Improved cultivation practices to prolong storage life in Onion |
| Mango | Introduction of alternative cropping pattern through horticultural crops |
| Flower crops | Improved management for Quality improvement in flower crops |
| Fruit and Vegetable | Post harvest management in horticultural crops |
| Nursery Management | Self-employment through fruit and veg nurseries in grapes & Horticulture crops |
| Field Crops | Integrated pest management in fruits vegetables, oilseeds and pulses |
| Vegetable crops | Safe & judicious use of pesticides for residue management |
| Organic farming | Organic farming, bio-pesticides, bio-fertilizers, |
| Vermi-compost | Production and supply of Worms, Recycling of Agro waste |
| Farm Mechanization | Improved farm machineries for labour, cost, time saving and drudgery reduction. |
| Farm Mechanization | Introduction of the selected improved farm machineries for major crops of the district. |
| Fruit & vegetable crops | Irrigation & fertilizers management through drip in fruit & vegetable crops |
| Vegetable and flowers | Protective cultivation of high value vegetable and flowers |
| Agril Information | Information about various developmental activities of different departments |
| Tech adoption & Impact | Assessment and impact evaluation of activities of KVK, Awareness of farmers about Internet |
| Survey Method | Imparting technical skill about PRA survey |
| Women child care | Introduce Nutritious foods in farmwomen’s & school going children’s diet. |
| Nutritional gardening | Popularize organic Nutritional gardening concept. |
| Women child care | Reduced laborious work through drudgery reduction technologies. |
| Agro processing | Develop Skill about soybean processing for increase it consumption. |
| Value addition | Create awareness about vegetable, fruit processing. Develop marketing skills |
| Backyard Poultry | Increase the productivity of animal & breed up gradation, small enterprise |
| Live stock health | Built Resistance for the diseases, Improve the health of live stock |
| Milk production | Clean Milk Production |
| Goat | Breed up gradation, |
| Animal nutrition | Nutrition management in animals, introduction and supply of improved fodder sets |

**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** |
| 10 | 09 | 160 | 106 | 19 | 21 | 600 | 617 |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Training** | | | | **Extension Programmes** | | | |
| **3** | | | | **4** | | | |
| **Number of Courses** | | **Number of Participants** | | **Number of Programmes** | | **Number of participants** | |
| **Targets** | **Achievement** | **Targets** | **Achievement** | **Targets** | **Achievement** | **Targets** | **Achievement** |
| 114 | 124 | 1634 | 3635 | 185 | 177 | 6500 | 6088 |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **Seed Production (Qtl.)** | | **Planting materials (Nos.)** | |
| **5** | | **6** | |
| **Target** | **Achievement** | **Target** | **Achievement** |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |

|  |  |  |  |
| --- | --- | --- | --- |
| **Livestock, poultry strains and fingerlings (No.)** | | **Bio-products (Kg)** | |
| **7** | | **8** | |
| **Target** | **Achievement** | **Target** | **Achievement** |
| 8 | 7 | 400 | 363 |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |

**3.1. B. Operational areas details during 2017-18**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| S.No. | Major crops & enterprises being practiced in cluster villages | Prioritized problems in these crops/ enterprise | Extent of area | Names of Cluster Villages identified for intervention | Intervention (OFT, FLD, Training, extension activity.)\* |
| 1 | Oilseed and Pulses | Improving the yield of oilseed, pulses by introducing the improved variety |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 2 | Field Crops | Use of Improved cultivation practices in agronomical crops |  | Jategaon, Thanapada, Chakore | OFT, FLD, Training, extension activity |
| 3 | Field Crops | Soil test based fertilizer recommendation |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 4 | Field Crops | Integrated nutrient management |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 5 | Field Crops | Use of bio-fertilizers for improved crop performance |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 6 | Grapes | Improved cultivation practices in quality fruit production in Grapes |  | Niphad | Trainings |
| 7 | Onion | Improved cultivation practices to prolong storage life in Onion |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 8 | Mango | Introduction of alternative cropping pattern through horticultural crops |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 9 | Flower crops | Improved management for Quality improvement in flower crops |  | Dindori | Trainings |
| 10 | Fruit and Vegetable | Post harvest management in horticultural crops |  | Jategaon, Thanapada, Chakore | Trainings |
| 11 | Nursery Management | Self-employment through fruit and veg nurseries in grapes & Horticulture crops |  | Jategaon, Thanapada, Chakore | Trainings |
| 12 | Field Crops | Integrated pest management in fruits vegetables, oilseeds and pulses |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 13 | Vegetable crops | Safe & judicious use of pesticides for residue management |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 14 | Organic farming | Organic farming, bio-pesticides, bio-fertilizers, |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 15 | Vermi-compost | Production and supply of Worms, Recycling of Agro waste |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 16 | Farm Mechanization | Improved farm machineries for labour, cost, time saving and drudgery reduction. |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 17 | Farm Mechanization | Introduction of the selected improved farm machineries for major crops of the district. |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 18 | Fruit & vegetable crops | Irrigation & fertilizers management through drip in fruit & vegetable crops |  | Jategaon, Thanapada, Chakore | Trainings |
| 19 | Vegetable and flowers | Protective cultivation of high value vegetable and flowers |  | Jategaon, Thanapada, Chakore | Trainings |
| 20 | Women child care | Nutritious foods in farmwomen’s & school going children’s diet. |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 21 | Nutritional gardening | Popularize organic Nutritional gardening concept. |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 22 | Women child care | Reduced laborious work through drudgery reduction technologies. |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 23 | Agro processing | Develop Skill about soybean processing for increase it consumption. |  | Jategaon, Thanapada, Chakore | Trainings |
| 24 | Value addition | Create awareness about vegetable, fruit processing. Develop marketing skills |  | Jategaon, Thanapada, Chakore | Trainings |
| 25 | Backyard Poultry | Increase the productivity of animal & breed up gradation, small enterprise |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 26 | Live stock health | Built Resistance for the diseases, Improve the health of live stock |  | Jategaon, Thanapada, Chakore | Trainings |
| 27 | Milk production | Clean Milk Production |  | Jategaon, Thanapada, Chakore | Trainings |
| 28 | Goat | Breed up gradation, |  | Jategaon, Thanapada, Chakore | FLD, extension activity |
| 29 | Animal nutrition | Nutrition management in animals, introduction and supply of improved fodder sets |  | Jategaon, Thanapada, Chakore | FLD, extension activity |

**3.2. Technology Assessment and Refinement**

**A1. Abstract on the number of technologies assessed in respect of crops**

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Thematic areas | Cereals | Oilseeds | Pulses | Commercial Crops | Vegetables | Fruits | Flower | Plantation crops | Tuber Crops | TOTAL |
| Integrated Nutrient Management |  |  |  |  |  | 1 |  |  |  | 1 |
| Varietal Evaluation | 1 |  |  |  |  |  |  |  |  | 1 |
| Integrated Pest Management |  |  |  |  | 1 |  |  |  |  | 1 |
| Integrated Crop Management |  |  |  |  |  |  |  |  |  |  |
| Integrated Disease Management |  |  |  |  |  |  |  |  |  |  |
| Small Scale Income Generation Enterprises |  |  |  |  |  |  |  |  |  |  |
| Weed Management |  |  |  |  |  |  |  |  |  |  |
| Resource Conservation Technology |  |  |  |  |  |  |  |  |  |  |
| Farm Machineries | 2 |  |  |  |  |  |  |  |  | 2 |
| Integrated Farming System |  |  |  |  |  |  |  |  |  | 1 |
| Seed / Plant production |  |  |  |  | 1 |  |  |  |  |  |
| Value addition |  |  |  |  |  |  |  |  |  |  |
| Drudgery Reduction |  |  |  |  |  |  |  |  |  |  |
| Storage Technique |  |  |  |  |  |  |  |  |  |  |
| Mushroom cultivation |  |  |  |  |  |  |  |  |  |  |
| Total | 3 |  |  |  | 2 | 1 |  |  |  | 6 |

**A2. Abstract on the number of technologies refined in respect of crops**

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Thematic areas | Cereals | Oilseeds | Pulses | Commercial Crops | Vegetables | Fruits | Flower | Plantation crops | Tuber Crops | TOTAL |
| Integrated Nutrient Management |  |  |  |  |  |  |  |  |  |  |
| Varietal Evaluation |  |  |  |  |  |  |  |  |  |  |
| Integrated Pest Management |  |  |  |  |  |  |  |  |  |  |
| Integrated Crop Management |  |  |  |  |  |  |  |  |  |  |
| Integrated Disease Management |  |  |  |  |  |  |  |  |  |  |
| Small Scale Income Generation Enterprises |  |  |  |  |  |  |  |  |  |  |
| Weed Management |  |  |  |  |  |  |  |  |  |  |
| Resource Conservation Technology |  |  |  |  |  |  |  |  |  |  |
| Farm Machineries |  |  |  |  |  |  |  |  |  |  |
| Integrated Farming System |  |  |  |  |  |  |  |  |  |  |
| Seed / Plant production |  |  |  |  |  |  |  |  |  |  |
| Value addition |  |  |  |  |  |  |  |  |  |  |
| Drudgery Reduction |  |  |  |  |  |  |  |  |  |  |
| Storage Technique |  |  |  |  |  |  |  |  |  |  |
| Mushroom cultivation |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |

**A3. Abstract on the number of technologies assessed in respect of livestock enterprises**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Thematic areas** | **Cattle** | **Poultry** | **Piggery** | **Rabbitry** | **Fisheries** | **TOTAL** |
| Evaluation of Breeds |  | 1 |  |  |  | 1 |
| Nutrition Management |  |  |  |  |  |  |
| Disease of Management |  |  |  |  |  |  |
| Value Addition |  |  |  |  |  |  |
| Production and Management |  |  |  |  |  |  |
| Feed and Fodder | 1 |  |  |  |  | 1 |
| Small Scale income generating enterprises |  |  |  |  |  |  |
| **TOTAL** | 1 | 1 |  |  |  | 2 |

**A4. Abstract on the number of technologies refined in respect of livestock enterprises**

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

**B. Achievements on technologies Assessed and Refined**

**B.1. Technologies Assessed under various Crops**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Thematic areas** | **Crop** | **Name of the technology assessed** | **No. of trials** | **Number of farmers** | **Area in ha (Per trail covering all the Technological Options)** |
| Integrated Nutrient Management | Mango | Spraying of 0.5% KNO3 to induce flowering 2% KNO3 at mustard size will increase the fruit set and retention +20ppm NAA to control fruit drop of Mango fruits. | 10 | 10 |  |
|  |  |  |  |  |
| Varietal Evaluation | Paddy | To assess Phule Samrudhi variety under micro situation | 10 | 10 |  |
|  |  |  |  |  |
| Integrated Pest Management | Tomato | Assessment of Use of Insect Proof Nylon Nets for quality vegetable seedling Production | 10 | 10 |  |
|  |  |  |  |  |
| Integrated Crop Management |  |  |  |  |  |
|  |  |  |  |  |
| Integrated Disease Management |  |  |  |  |  |
|  |  |  |  |  |
| Small Scale Income Generation Enterprises |  |  |  |  |  |
|  |  |  |  |  |
| Weed Management |  |  |  |  |  |
|  |  |  |  |  |
| Resource Conservation Technology |  |  |  |  |  |
|  |  |  |  |  |
| Farm Machineries | Paddy | Mini paddy thresher for small farmers for small farmers | 10 | 10 |  |
| Paddy | Introduce Mini Rice Mill Unit | 10 | 10 |  |
| Integrated Farming System |  |  |  |  |  |
|  |  |  |  |  |
| Seed / Plant production | Onion | Sowing of Mustard, Maize & carrot seed in Onion seed production Plot for higher Seed yield | 10 | 10 |  |
|  |  |  |  |  |
| Value addition |  |  |  |  |  |
|  |  |  |  |  |
| Drudgery Reduction |  |  |  |  |  |
|  |  |  |  |  |
| Storage Technique |  |  |  |  |  |
|  |  |  |  |  |
| Mushroom cultivation |  |  |  |  |  |
|  |  |  |  |  |
| **Total** |  |  |  |  |  |

**B.2. Technologies Refined under various Crops**

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

**B.3. Technologies assessed under Livestock and other enterprises**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Thematic areas** | **Name of the livestock enterprise** | **Name of the technology assessed** | **No. of trials** | **No. of farmers** |
| Evaluation of breeds | Poultry | To compare the Performance of Desi and Improved desi birds in backyard system. | 10 | 10 |
| Nutrition management |  |  |  |  |
| Disease management |  |  |  |  |
| Value addition |  |  |  |  |
| Production and management |  |  |  |  |
| Feed and fodder | Goatary | To Check the B:C ratio with & without kid ration | 10 | 10 |
| Small scale income generating enterprises |  |  |  |  |
| **Total** | | |  |  |

**B.4. Technologies Refined under Livestock and other enterprises**

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

**C1.Results of Technologies Assessed**

**OFT-1**

**Results of On Farm Trial**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | **Problem definition** | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Crop (Paddy) | Rainfed | Low productivity of Paddy due to use of local variety | To assess Phule Samrudhi variety under micro situation | 10 | Variety | 1.Number of Tillers per plant  2. Yield (q/ha) | 32  28.50 | The variety gives better yield | More no. of tillers per plant enhanced yield | - | - |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| Technology option 1 (Farmer’s practice): Indrayani | MPKV, Rahuri | 28.50 | q/ha | 16100 | 1.55 |
| Technology option 2 : Phule Samrudhi | MPKV, Rahuri | 15.75 | q/ha | 7425 | 1.42 |
| Technology option 3 |  |  |  |  |  |

**C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details**

1 Title of Technology Assessed: To assess Phule Samrudhi variety under micro situation

2 Problem definition: Low productivity of Paddy due to use of local variety

3 Details of technologies selected for assessment: T1 - Farmers practice – Indrayani, YSR, Komal, T2 - Phule Samrudhi

4 Source of technology : MPKV, Rahuri

5 Production system : Rice based cropping system

Thematic area : Integrated Crop Management

6 Performance of the Technology with performance indicators:

1. Number of Tillers per plant : 32,

2. Yield (q/ha) : 28.50

7 Feedback : More no. of tillers per plant enhanced yield

Matrix scoring of various technology parameters done through farmer’s participation / other scoring techniques : More no. of tillers per plant enhanced yield : It is observed that the average no. of tillers were 32 in demonstration plot, which was more as compared to local varieties.

8 Final recommendation for micro level situation : The variety indicated better performance (28.50 q/ha) as compared to local (15.75 q/ha).

9 Constraints identified and feedback for research : Nil

10 Process of farmers participation and their reaction : The farmers were adopting local variety viz. Indrayani, Komal, 1008 etc. These varieties got low yield in last year. Therefore, the improved and high yielding variety like Phule Samrudhi was selected for assessment. According to need of variety and soil type, the 10 progressive farmers were selected for conducting demonstration. Prior to implementation, the soil sample analysis has done and conducted training on improved practices of paddy cultivation. Considering soil health, the integrated nutrient management and integrated pest, disease management practices followed during the crop growth. The improved variety Phule Samrudhi had more number (32) of tillers as compared to local varieties (21). The farmers were accepted this variety.

**OFT-2**

**C1.Results of Technologies Assessed**

**Results of On Farm Trial**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | **Problem definition** | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Onion | Irrigated | Poor Quality & low yield in Onion Seed Production | Sowing of Mustard, Maize & carrot seed in Onion seed production Plot for higher Seed yield. | 10 | T1 – Farmers practice: No use of attractant crop for bees and insects in Onion seed plot. | 1. C: B Ratio  2. Yield | 1.66  1.8 q/ha | Poor and light seed is more | - | - | - |
| T2 - Sowing of crops like Mustard /  Maize / Carrot/sunflower in Onion seed plot | 1.increase % yield in Onion seed production  2.B:C Ratio  3. Yield | 22.22%  2.52  2.2q/ha | Good quality seed | Visually seen the pollinators like honey bees visiting the plots. Now farmers themselves had shown the pollinator attractant crops. | - | - |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| Farmers practice: No use of attractant crop for bees and insects in Onion seed plot. |  | 1.8 | q/ha | 37600 | 1:1.66 |
| Sowing of crops like Mustard /  Maize / Carrot/sunflower in Onion seed plot | DOGR, Rajgurunagar, Kanda Bijotpadan Bulletin.2009 | 2.2 | q/ha | 43500 | 1:2.52 |

**C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details**

1. **Title of Technology Assessed** : Sowing of Mustard, Maize & carrot seed in Onion seed production Plot for higher Seed yield.
2. **Problem Definition:** Onion seed produced by the farmers are having in light weight, poor germination. So, they need more seed for sowing. The seedlings produced from the seed are weak and giving small bulb setting. All these factors gives low and poor yield. Due to low productivity and low market rates farmers getting less income per acre which could not meet the cost of production. After identifying all problem assessment was planned Sowing of Mustard, Maize & carrot seed in Onion seed production Plot with objectives as

1. To improve the Onion Seed yield

2.To attract the pollinators.

3.To increase the yield and quantity of onion bulbs.

3. **Details of technologies selected for assessment:**

***T1 – Farmers practice: No use of honey bees and insect attractants in Onion seed production***.

Farmers are directly sowing the onion seed bulbs in flat beds with sowing pollinator attracting crop or plants. Regularly using pesticides for controlling insect pest on crops harms the insect activity affects the seed production.

***T2 - Sowing of Mustard Maize & carrot seed in Onion seed production Plot.***

Farmers are suggested thatafter 10-15 days of transplanting of onion bulb sets as they started sprouting. Maize is planted on border bunds. Mustard is broad casted in between the rows of bulb sets in beds. Carrot is sown in banks of beds on raised side for good germination and growth.

**4. Source of technology:** DOGR, Rajgurunagar, Kanda Bijotpadan Bulletin.2009

**5. Production system and thematic area:** Tribal farmers in the adopted villages are Chirapali & Chakore in Traymbakeshawar tahasil. The average rainfall of Tryambakeswar tahasil is 2256mm in kharif 2017. Considering the rainfall status, the farmers are adopting rice based cropping system. From last few years after rice they cultivating commercial vegetable due to availability irrigation system like pumps, pipes so they started individual lift irrigation from river. Some, farmer’s dig wells. So, after rice crop is over they planting Tomato, Brinjal and chilli as well as cabbage, cauliflower in Rabi Season. Onion farmers from traditional get very good return from last one decade so, those tribal farmers are also attracted to cultivate to get good returns. They bring locally available planting material in the form of ready seedling in the major onion belt of district. But, it is very costly so from next crop they try to producing seed on own field by using last year’s selected bulbs. Farmers are getting very low yield from seed production and poor and light seed with poor germination.

Area under onion crop in these selected villages increased day by day. Improved and Quality seed was not available to the farmers due to shortage of seed in market. Many private companies introduced the seed material in market but it is very costly it should not be affordable to these tribal farmers. So, farmers started onion seed production.

Rabi/Summer onion is planted in this area after Kharif vegetable crop like tomato, brinjal etc. Very small plot size farm area, limited resources and lack of sufficient funds average farmer is planting less than one acre area under rabi onion. Those farmers having assured irrigation facility in rabbi and summer season are only cultivating the onions.

Onion (*Allium cepa*) flowers consist of a spherical umbel made of florets that are less than 5 mm in length. The florets have six stamens, a single style and an ovary with two ovules. It takes about two weeks for all the florets on an umbel to open completely. Most of the pollen is made available on the first day and the remainder on the second day. The pollen is shed before the stigma becomes receptive. Pollen viability declines quickly after the floret opens. The stigma of a flower may still be viable for up to 6 days after it opens. The flowers are self-fertile so pollen from one floret can pollinate another floret on the same umbel.

The flowers are visited by a range of insects that collect pollen and nectar. White colour and poor fragrance of flower of umbel difficult to attract the insects

Onion is cross pollinated crop and efficient pollination depends largely on presence of insects in the area and their activity at flowering time. It is essential to ensure that there is sufficient population of pollinating insects including honeybees to achieve the full potential of onion seed and consequent higher seed yield.

Onion is pollinated by insects like honeybees. Insecticides should not be applied during the noon time when the beneficial insect activity is high; so it should be applied during the time when there are no movements of insects.

In order to attract the pollinating insects like honey bees which are very effective role in cross pollination in major crops. Onion bulb sets for seed production are planted in Sept-Oct and it starts flowering in Nov- Dec after 40-45 days of transplanting. It was recommended by onion and garlic research institute to sow crops like Mustard, Maize & carrot to attract pollinating insects in onion seed production field. These crops are sown after 10-15 days of transplanting of onion bulb sets and as they started sprouting. Maize is planted on border bunds. Mustard is broad casted in between the rows of bulb sets in beds. Carrot is sown in banks of beds on raised side for good germination and growth. These crops having attractive flower colours and receptive stigma to attract the pollinators like honey bees which also visiting the onion umbels helps for cross pollination.

**Thematic area:** *Seed Production*

**6. Performance of the Technology with performance indicators:**

1. increase % yield in Onion seed production

2. B:C Ratio

Increase in onion seed yield by 12 percent and 30 kg per hectare B: C ratio (1:1.42) .More Honey bees & beneficial insects observed. Low cost technology for any group of farmer. Onion is cross pollinated crop and efficient pollination depends largely on presence of insects in the area and their activity at flowering time. It is essential to ensure that there is sufficient population of pollinating insects including honeybees to achieve the full potential of onion seed and consequent higher seed yield.

**7. Feedback, matrix scoring of various technology parameters done through farmer’s participation / other scoring**  **techniques :** As per the recommendation farmers were aware about the benefit of sowing attractant crops in the field of onion seed production plot. Given Mustard, carrot and maize seed for sowing. Accordingly farmers followed the guidelines and found the benefits and visually seen the pollinators like honey bees visiting the plots. Now farmers themselves had shown the pollinator attractant crops.

8. **Final recommendation for micro level situation:** Farmers should sow the pollinator attractant crops in onion seed production field for quality and higher yield of onion seed.

**9. Constraints identified and feedback for research:** Low level of awareness among the farmers to sow the pollinator attractant crops in onion seed production.

**10. Process of farmers participation and their reaction :** 20 onion seed producing farmers in average 4-5 R area selected for the assessment. They are given seed of Maize 100 gm, Mustard-25 gm, Carrot-15 gm for sowing. The cost of input is about Rs. 150 per farmers and total cost is Rs. 3000/- for 20 participating farmers.

**OFT-3**

**C1.Results of Technologies Assessed**

**Results of On Farm Trial**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | **Problem definition** | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Tomato | Irrigated | Heavy of viral infestation due to sucking pests like white fly, jassids and aphids. | Assessment of Use of Insect Proof Nylon Nets for quality vegetable seedling Production. | 12 | T1 – Farmers practice: No use of insect Net or other covers to protect vector infestation.  Vegetable farmers were raising seedlings | 1.yield q/ha  2.% Viral Infestation on vegetable plants after  transplanting  3.B:C Ratio | 475q/ha  25%  1.71 | 25 % Viral Infestation on vegetable plants after  transplanting | Less infestation of diseases and pest which saves the expenses on pesticides and fungicides. | - | - |
| T2 - 50 mesh nylon nets have to be covered over to the Tomato seedling beds  Vegetable nursery beds or portrays | 1.yield q/ha  2.% Viral Infestation on vegetable plants after  transplanting  3.B:C Ratio | 535q/ha  5%  3.8 | 5% Viral Infestation on vegetable plants after  transplanting | - | - |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| Farmers practice: No use of insect Net or other covers to protect vector infestation.  Vegetable farmers were raising seedlings | IIHR, Bangalore | 475 | q/ha | 46800 | 1:1.71 |
| 50 mesh nylon nets have to be covered over to the Tomato seedling beds  Vegetable nursery beds or portrays | 535 | q/ha | 119300 | 1:3.18 |

C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details

1. **Title of Technology Assessed :** Assessment of Use of Insect Proof Nylon Nets for quality vegetable seedling Production.

**2. Problem Definition :** Area under vegetable cultivation is increasing in adopted village. Major commercial crops like Tomato, Brinjal, Chilli , Cabbage and Cauliflower is cultivated in Kharif and Rabi season. Majority of verities grown by the farmers are F1 Hybrids and from private companies. Due to variation in verities and crop density increasing day by day farmers are facing the problem of fungal viral diseases. Heavy of viral infestation due to sucking pests like white fly, jassids and aphids. This infestation is inoculated in nursery seedling stage in vegetable crop. About 10-15 percent losses has been observed in vegetable crops due to this disease. In order to prevent the infestation in seedlings stage from vector insects vegetable seedling nursery should be protected with 50 mesh insect net. Assessment on use of Insect Proof Nylon Nets for quality vegetable seedling Production was conducted to overcome the problem with some extent.

1. **Details of technologies selected for assessment :** T1 – Farmers practice: No use of insect Net or other covers to protect vector infestation.

Vegetable farmers were raising seedlings traditionally on flat or raised bed in open climate. Climatic factors like temperature, sunlight, humidity and heavy rains damage the seedlings. Due to sucking pest attack seedlings are infested with viral disease.

T2 - 50 mesh nylon nets have to be covered over to the Tomato seedling beds

Vegetable nursery beds or portrays are protected with UV stabilized 50 mesh insect net. Fully coved beds are protected from entry of insect vectors sucking pests causing viral infestation in crop growth stage.

1. **Source of technology :** IIHR, Bangalore
2. **Production system and thematic area :** Tribal farmers in the adopted villages are Chirapali & Chakore in Traymbakeshawar tahasil. The average rainfall of Tryambakeswar tahasil is 2256mm in Kharif 2017. Considering the rainfall status, the farmers are adopting rice based cropping system. From last few years after rice they cultivating commercial vegetable due to availability irrigation system like pumps, pipes so they started individual lift irrigation from river. Some, farmer’s dig wells. So, after rice crop is over they planting Tomato, Brinjal and chili as well as cabbage, cauliflower in Rabi Season. The land holding of the farmers in the village is limiting factor to farming. Major part of land is in small plots. The soil has low cation exchange capacity and acidic in nature. The organic carbon, nitrogen and phosphorus content is very low in the soil. In all total, the soil is having low fertility status. Wide range of soils from rich loam to poor shallow upland soils with good organic matter and PH range 4.5 to 8.0.

The production of good quality vegetable seedlings is essential for optimizing crop growth and yields in vegetable crop. High quality vegetable seeds are expensive, so buying the plants needed as seedlings can ensure that less seed is wasted.

The vegetable growers producing seedlings is in a selected area in the ground. This is the traditional method, but exposes the plants to weather damage and early disease infections. This method has some disadvantages. The risk of seedling mortality due to exposure to pests and diseases and adverse weather conditions. Mechanical damage to the root system and shock when the seedlings are directly pulled from the soil. When the nursery is located far from the main field, the time taken between uprooting and transplanting of the seedlings may result in a lower rate of survival. Considering the problems of seedling production under open field conditions, it is better to grow seedlings for commercial cultivation in a nursery under protective cover.

Vegetable like tomato, brinjal, chili seedlings can be raised in facilities ranging from simple shelters to sophisticated greenhouses. All structures should protect seedlings from heavy rainfall, low (≤ 5 °C) or high (≥ 35 °C) temperatures, intense sunlight, high relative humidity, and exposure to pests and diseases. Moderately simple net houses or net tunnels covered with 50- to 60-mesh nylon netting are recommended to prevent insect pests such as whiteflies and aphids from transmitting viruses to young tomato plants. 50-60 mesh netting will also prevent many pests from entering. Tomato seeds germinate best in the dark. After sowing, shade netting (50% light penetration) can be used to cover the tunnels, or it can be placed inside the net house under the plastic sheet to enhance seed germination. In the wet season, plastic sheets can be used to cover the tunnels to protect seedlings from rain.

A net house needs to be supported either by a wooden, or steel framework. Wooden frameworks have the advantage of being cheaper, but do not last as long as steel frames.

Low tunnels made of netting are the cheapest form of seedling protection. However they do not provide as convenient access as large walk-in net houses. Using 1 cm wide iron bars or bamboo sticks make them into inverted, “U” shapes 2 m wide and 1 m high over each bench or raised bed. Maintain a distance of 1 m between two adjacent bars within the row. Place 60-mesh nylon net over the bar from one end of the row to the other. Pull the net tightly over the bars from all four sides and bury 10-15 cm of net edging in the soil. Make sure there are no gaps between the soil and the net, as these gaps allow insects to get in.

**Thematic area:** Integrated Pest Management

1. **Performance of the Technology with performance indicators :** Results shown minimize the viral infestation by 70 percent. Produce healthy seedlings results increase in yield (290 Q/ha.) B:C ration 1:1.40. Reduced cost on insecticide compared open vegetable nursery. Using this technology farmer can produce vegetable seedlings on his own field. It saves the cost of ready seedlings from commercial vegetable nursery. Quality and timely availability of seedlings saves time as he can transplant the crop in time.

Vegetable seedlings of commercial vegetable crops like Tomato, Chilli, Brinjal should be raised in insect proof net to protect from viral infestation.

1. **Feedback, matrix scoring of various technology parameters done through farmer’s participation / other scoring techniques:** 50 mesh nylon UV stabilized Insect net was provided by KVK to the 20 vegetable growers in two tribal villages. Support structure required was prepared by farmer. As per the technical guideline farmer followed the required monitoring & observations. Farmers found the protected net structure technology useful to produce virus free quality& healthy seedling production. It was also observed that minimum weed was grown in nursery beds. Less infestation of diseases and pest which saves the expenses on pesticides and fungicides.
2. **Final recommendation for micro level situation:** Use of insect net to protect the insect vector causing viral infestation is beneficial for virus free seedlings. It is needed to standardized the technology in different season, types and different mesh insect nets. Need to clarify types of observations symptoms of infestations are visible on vegetable seedlings in nursery stage and how to record the observations. Need to develop low cost structures using available material with farmers.
3. **Constraints identified and feedback for research:** Cost of the insect net is higher and it is not affordable for low income farmer. Cost for permanent supporting structure and proper design of structure is not available.
4. **Process of farmers participation and their reaction :** Total 40 vegetable farmers 20 from each village was participated in this trial. Each farmer was supplied 6 m x 10 m total 60 Sqm UV stabilized 50 mesh white colored insect net. Desired structure required to support to net was built by the farmer using locally available material like Bamboo. The cost of 60 SQM net was Rs. 2850/-. Net was provided by KVK under Tribal Sub Plan. It will be used 3-5 years by the farmers in all seasons for major commercial vegetable crops

**OFT-4**

**C1.Results of Technologies Assessed**

**Results of On Farm Trial**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | **Problem definition** | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Mango | Irrigated | farmers facing the problem of fruit retention and fruit drop. | Spraying of 0.5% KNO3 to induce flowering 2% KNO3 at mustard size will increase the fruit set and retention +20ppm NAA to control fruit drop of Mango fruits. | 14 | T1 –Farmers practice: Use of Organic Manure + Mixed fertilizer, No spray for fruit set and retention | 1. yield in Mango  2. Av. Fruit retention  2.B: C Ratio | 375q/ha  150-160 fruits/plant  3.18 | Observed less retention and more fruit drop | Treatment beneficial and fruit retention and control of fruit drop was observed. | - | - |
|  |  |  |  |  | T2 - Recommended Dose of FYM+ RD of Chemical Fertilizers + spraying of of 1% KNO3 to induce flowering and Spraying 2% KNO3 at mustard size+ 20 ppm NAA at pea size | 1.Increase % yield in Mango  2. Av. Fruit retention  2.B: C Ratio | 525q/ha  200-220 fruits/plant  4.42 | Observed more retention and less fruit drop | - | - |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| T1 –Farmers practice: Use of Organic Manure + Mixed fertilizer, No spray for fruit set and retention | MPKV Rahuri | 375 | q/ha | 76800 | 1: 3.18 |
| T2 - Recommended Dose of FYM+ RD of Chemical Fertilizers + spraying of of 1% KNO3 to induce flowering and Spraying 2% KNO3 at mustard size+ 20 ppm NAA at pea size | 525 | q/ha | 146300 | 1:4.42 |

**C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details**

**Title of Technology Assessed :** Spraying of 0.5% KNO3 to induce flowering 2% KNO3 at mustard size will increase the fruit set and retention +20ppm NAA to control fruit drop of Mango fruits.

**2. Problem Definition :** Fully grown grafted mango plants of improved varieties planted on farm bunds and sloppy lands in selected area of tribal village. Plants are well developed. Irrigationand nutrition is managed timely even though farmers facing the problem of fruit retention and fruit drop.

**3.Details of technologies selected for assessment :** T1 –Farmers practice: Use of Organic Manure + Mixed fertilizer, No spray for fruit set and retention

Mango trees are planted on farm bunds and sloppy and marginal lands in hilly track of the area. Soil and climatic conditions are widely suitable for mango trees. Farmers using FYM and small amount of mix chemical fertilizers for plant nutrition.

T2 - Recommended Dose of FYM+ RD of Chemical Fertilizers + spraying of 1% KNO3 to induce flowering and Spraying 2% KNO3 at mustard size+ 20 ppm NAA at pea size

In addition to FYM recommended dose of split fertilizer dose is given with proper irrigation management. To overcome the problem of fruit rotation and fruit drop foliar spray of 2% KNO3 before and after flowering was given. To control the fruit drop after fruit setting and pea size fruit size two spray of 20ppm NAA was given

**4. Source of technology :** MPKV, Rahuri

**5. Production system and thematic area :** Mango (Mangifera indica L.) belonging to Family Anacardiaceous is the most important commercially grown fruit crop of the country.  It is called the king of fruits.  India has the richest collection of mango cultivars.

Tribal farmers in the adopted villages are Chirapali & Chakore in Traymbakeshawar tahasil. The average rainfall of Tryambakeswar tahasil is 2256mm in Kharif 2017. Considering the rainfall status, the farmers are adopting rice based cropping system. From last few years after rice they cultivating commercial vegetable due to availability irrigation system like pumps, pipes so they started individual lift irrigation from river. Some, farmer’s dig wells. Soil of the selected villages are red loamy are quite ideal. for successful cultivation of mango crop. Farmers planted improved mango cultivar like Kesar, Alphanso and Rajapuri on farm bunds.

.

Mango fruit is very popular with the masses due to its wide range of adaptability, high nutritive value, richness in variety, delicious taste and excellent flavour.  It is a rich source of vitamin A and C. The fruit is consumed raw or ripe. Good mango varieties contain 20% of total soluble sugars. The acid content of ripe desert fruit varies from 0.2 to 0.5 % and protein content is about 1 %.

Farmers in tribal village planted mango trees on bunds, sloppy and marginal land as perennial and alternate source of income. Each tribal family is planted 30-40 Kesar mango plants in his farm. Plants well grown and started giving yield from 3-4th year of plantation. Even though there is profuse flowering farmers facing the problem flower and fruit drop, low retention of fruits which affects the mango yield.

Use of chemicals to induce flowering in mango Among the macro nutrients, nitrogen plays an important role in flowering of mango. Several studies conducted in mango proved positive to urea and KNO3 spray before flowering. Besides, micronutrients like zinc and boron were found to improve flowering in mango. KNO3 2 % 20 days before Flower induction flowering NAA 20 ppm At flowering stage Improved fruit set.

It is a plant hormone spray with Napthalic Acetic Acid content of 4.5% SL. This plant growth regulator is used for  to induce flowering, to prevent shedding of buds, flowers and unripe fruits. to enlarge fruit size to increase the yield and to improve the quality of fruits. 5 ml NAA in 10 litres of water i.e. 50 ppm (0.05%) Spray when the fruits are in Peas size.

Fertilizer applied to the mango tree via the soil cannot be utilized by the developing flowers; hence, foliar spray is needed. When Potassium Nitrate is sprayed on the tree it becomes a fast and effective source of potassium and nitrogen.It is recommended to spray twice first spray 1 to 2 percent KNO3 solution at about 42 days after flower induction. The first application is done to encourage fruit setting and minimize fruit drop. Second spray,1 to 2 percent KNO3 solution at about 65 days after induction. This is done to increase fruit size.

  Assessment on spraying of 2 % KNO3 to induce flowering 2% KNO3 at mustard size will increase the fruit set and retention + 20ppm NAA to control fruit drop of Mango fruits. Assessment was conducted in Mango inflorescence arising in the month of Jan- march in year 2017

**Thematic area:** *Nutrient Management*

**6. Performance of the Technology with performance indicators :**

1.Increase % yield in Mango

2. Av. Fruit retentions

2.B: C Ratio

Foliar fertilizer applied to the mango tree via the soil cannot be utilized by the developing flowers; hence, foliar spray is needed. When Potassium Nitrate is sprayed on the tree it becomes a fast and effective source of potassium and nitrogen.It is recommended to spray twice first spray 1 to 2 percent KNO3 solution at about 42 days after flower induction. The first application is done to encourage fruit setting and minimize fruit drop. Second spray of 1 to 2 percent KNO3 solution at about 65 days after induction. This is done to increase fruit size.

Fruit retention of small mango fruits was increased also control the fruit drop under adverse conditions. Farmers must schedule 2 sprays of2% KNO3 at mustard size along with regular plant protection measures.

**7. Feedback, matrix scoring of various technology parameters done through farmer’s participation / other scoring techniques :** As per advise farmers are following the recommendations and schedule of flowering along with their regular plant protection measures. Due to adverse climate and water shortage it was difficult to control the problem at certain extend. Farmers found the treatment beneficial and fruit retention and control of fruit drop was observed.

**8. Final recommendation for micro level situation:** Uneven flowering or 2-3 stage flowering in mango causes scorching in late flowering stage. so further trails on different flowering and growth stages should be conducted.

**9.Constraints identified and feedback for research:** Uneven 2/3 stages mango flowering found difficulty in spraying at proper stages causes adverse effect on earlier stages.

**10.Process of farmers participation and their reaction:** 20 farmers with average 40 plants of Mango was selected for assessment. Critical Input Potassium Nitrate KNO3 (13:00:45) -1kg and Plano fix (NAA) -100ml given each farmers. Cost for one demonstration was Rs.250/- each. Total cost was Rs.5000/-

**OFT-5**

**Results of On Farm Trial**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | **Problem definition** | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Paddy | Rainfed | Introduction of suitable selective mechanisation for paddy threshing for small farmers | Mini paddy thresher for small farmers for small farmers | 10 | Mini paddy thresher | Lab,  time,  cost, output, drudgery | |  |  |  | | --- | --- | --- | | Labour | Nos. | 3.00 | | Time | hrs/qtl | 1.5 | | output | qtl/hr | 0.67 | | Cost | Rs./qtl | 35.00 | | drudgery |  | low | | |  |  | | --- | --- | | Labour saving | 50.00% | | Time saving | 48.28% | | Increase in Output | 93.33% | | Cost saving | 76.67% | | drudgery | low | | Some of the grains go un- threshed in the paddy straw bundles. However the speed of operation is satisfactory | Making small sized paddy bundles for the threshing operation or mechanical changes. | Small sized bundles may expose smaller straws better to the beating drum |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| Technology option 1 (Farmer’s practice) | Local practice |  |  |  |  |
| Technology option 2 | Commercially available, but not suitable, accessible | NA |  | NA | NA |
| Technology option 3 | MPKV, Rahuri |  |  |  |  |

**C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details**

1. Title of Technology Assessed : Mini paddy thresher for small farmers for small farmers
2. Problem Definition :

Although machineries like combine harvester to reapers, threshers are available, the adoption in the area remained very selective. There are still limitations in adoption of these farm machineries in areas with poor connectivity and with marginal land holdings. These farm families in the tribal areas still perform these operations manually. The threshing and winnowing operations in paddy are done manually separately with a traditional method. These operations are drudgerious, time consuming and costly.

The commercial custom hiring services for paddy harvesting with vertical conveyor reaper are made available by farmer entrepreneurs. However, the threshing and winnowing operations in paddy are still performed manually due to unavailability of the threshers in poorly connected and very small farms and crop volumes. Considering topographical & socioeconomic conditions in the tribal area, paddy mechanization need to be further customized to suit the local conditions. Hence, the self propelled mini paddy thresher cum winnower could be one of the appropriate option to meet the requirement.

It was planned to introduce self propelled paddy mini thresher cum winnowers for small farmers, to reduce the time, cost and drudgery in paddy threshing & winnowing in small tribal farmers. Considering the small farm sizes, the community use of paddy machineries would be more appropriate.

1. Details of technologies selected for assessment:
2. Farmer’s practice: Paddy threshing on the small farms is done by beating paddy ear-heads on ground. Winnowing the grains in the natural wind as and when available to clean the trash.
3. Improved technology: Mini paddy thresher cum winnower. This machine is petrol engine operated with combined operations. This machine is small sized portable. This can be transported easily to small farms with relatively poor connectivity.
4. Critical inputs : Mini paddy thresher cum winnower , one unit Rs.30,000 for farmers group, Operational village: Chirapali, Tal. Traymbakeshawar.

4. Source of technology: AICRP, MPKV, Rahuri

5. Production system and thematic area: Paddy, Rainfed, Agril mechanization

6. Performance of the Technology with performance indicators:

Table: Performance of the technology

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| ***Technology Option*** | ***No.of trials*** | ***Yield, (t/ha)*** | ***Net Rs.*** | ***B:C ratio / Saving in operations*** | ***Data on Other performance indicators\**** |
| *Farmers Practice:*  *Paddy threshing & winnowing manually* | *10* | *\_* | *\_* | *\_* | |  |  |  | | --- | --- | --- | | Labour | Nos. | 6.00 | | Time | hrs/qtl | 2.9 | | output | qtl/hr | 0.34 | | Cost | Rs./qtl | 150.00 | | drudgery |  | high | |
| *Technology :*  *mini paddy thresher cum winnower (Padgilwar make)* | *\_* | *\_* | |  |  | | --- | --- | | Labour saving | 50.00% | | Time saving | 48.28% | | Increase in Output | 93.33% | | Cost saving | 76.67% | | |  |  |  | | --- | --- | --- | | Labour | Nos. | 3.00 | | Time | hrs/qtl | 1.5 | | output | qtl/hr | 0.67 | | Cost | Rs./qtl | 35.00 | | drudgery |  | low | |

|  |  |
| --- | --- |
| cost of the machine | 30000 |
| recovery period | 5 |
| cost per year (a/b) | 6000 |
| maintenance cost (10 % of c) | 600 |
| total cost of dep.+maint per year (c+d) | 6600 |
| average area covered per year qtl | 200 |
| average cost of machine per ha (e/f) | 33 |
| operational cost per ha (Rs.300 for skilled labour+Rs.300 for fuel, etc. for 10qtl per day = 600 for 10 qtl =35 per qtl | 35 |
| total cost (machine cost +dpr+operational)(g+h) | 68 |

7. Feedback, matrix scoring of various technology parameters done through farmer’s participation / other scoring techniques: The testing of the machine was under taken as the next operational intervention after the traditional paddy reaping and natural drying as practiced by the farmers. Although two to three percent grains go un-threshed in the straw bundles, the farmers’ feedback is such that the machine performs threshing and winnowing much speedier than the manual operation. Grains going un-threshed may be due to insufficient exposure of the ear-heads to the threshing drum.

8. Final recommendation for micro level situation: As per the farmer’s perception, some of the ear heads go un-threshed. This may be due to the reason that size of straw bundles made after the reaping are of medium size. This also includes uneven length straws with ear-heads. There are chances that some of the shorter straws with ear-heads are not sufficiently exposed to the rotating drum. Hence a smaller size straw bundles are advices so that all the straws are exposed to rotating drum.

9. Constraints identified and feedback for research: The machine is self propelled 3.5 HP engine operated, particularly suited for inaccessible areas. Unavailability of the repair and maintenance services of the engine has been one of the constraints perceived by the farmers. However, further trials, community use and benefits may help find solutions to these constrain.

Feedback for Research: The machine performs threshing and winnowing much speedier than the traditional manual operations. As perceived by the farmers, approx. two to three percent grains go un-threshed in the straw bundles. This may be due to lack of exposure or insufficient exposure of the ear-heads to the rotating threshing drum. Prior specific instructions to farmers to make small sized straw bundles while harvesting and bundling or any other effective suitable alternative may be tried that may reduce the un-threshed grain percentage .

10. Process of farmers participation and their reaction: Farming, and socioeconomic conditions and need were assessed during the surveys of the adopted villages. As per the felt need, the village farmers groups were actively involved in the assessment of the machine consecutively for second year. Also, traditionally, finger millet threshing

**OFT- 6**

**Results of On Farm Trial - 1**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | **Problem definition** | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Goat Kids | Free Grazing | Financial inability for concentrate feeding of Poor Goat farmers | To Check the B:C ratio with & without kid ration | 10 | T1 : Farmers Practice- No Concentrate feeding | 1. Regular weight gain in kids – every month – 3-6 month  2. Cost of Concentrate feeding  3. BC Ratio | Average wt. (6th M) 6.2 Kg  -  1.19 | Concentrate feeding to kids in 3-6th month of age are not showing significant for market concentrate feed. Comparatively home-made concentrate feed showing significant results than the treatment with no concentrate feed. | Farmers are not getting the price from market which invested to high cost market feed concentrate.  The raw material available with farmers are much significant for home-made concentrate feeding | - | - |
|  |  |  |  |  | T2 : Homemade Concentrate feed | 1. Regular weight gain in kids – every month – 3-6 month    2. Cost of Concentrate feeding  3. BC Ratio | Average wt. (6th M) 7.3 Kg  Rs. 535/-  1.27 |
|  |  |  |  |  | T3 : Concentrate feeding | 1. Regular weight gain in kids – every month - 3-6 month    2. Cost of Concentrate feeding  3. BC Ratio | Average wt. (6th M) 7.9 Kg  Rs. 701/-  1.23 |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| No Use of Concentrate feed | Mafsu | Average wt. (6th M) 6.2 Kg | kg/animal | 250 | 1.19 |
| Use of Homemade Concentrate feed | Average wt. (6th M) 7.3 Kg | kg/animal | 390 | 1.27 |
| Use of Market Concentrate feed | Average wt. (6th M) 7.9 Kg | kg/animal | 374 | 1.23 |

**C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details**

1 Title of Technology Assessed - To Check the B:C ratio with & without kid ration.

2 Problem Definition - Financial inability for concentrate feeding of Poor Goat farmers.

3 Details of technologies selected for assessment - To feed concentrate to Kids up-to 6 month age.

4 Source of technology - MAFSU

5 Production system and thematic area - Feed management

6 Performance of the Technology with performance indicators - 1. Regular weight gain in kids - every month - 3-6 month

2. Cost of Concentrate feeding,

3. B:C ratio

7. Feedback, matrix scoring of various technology parameters done through farmer’s participation / other scoring

techniques

8 Final recommendation for micro level situation - Concentrate feeding to kids in 3-6th month of age are not showing significant results.

9 Constraints identified and feedback for research – Availability of raw material for home made concentrate was the major constraint

10 Process of farmers participation and their reaction - Farmers are not getting the price from market which invested to feed concentrate

**OFT- 7**

**Results of On Farm Trial**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | Problem definition | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Paddy | - | The hullers are low capacity mills. In these, shelling and polishing operations are carried out simultaneously. Hence there is no control on the polishing of rice, bran and a higher breakage of rice occurs. To overcome this entire problems mini rice mill was designed to meet the needs of the villagers and a substitute for a huller mill. | Introduce Mini Rice Mill Unit | 10 | Mini Rice Mill | 1. Milling Capacity (kg/hr)  2. Milling percentage– Grades (Head rice, Broken rice)  3. Cost of operation | 90 kg/hr  60%  Rs1/kg | 151 Q paddies processed which gives 81 Q rice & 70 Q paddies. Paddy was sold @ 5/kg | It saved time and money of hundreds of tribal farmers.  Nearby 3 villages farmers were benefitted. Framers could sale their cleaned rice for Rs. 42/Kg which was sold earlier at Rs.20/ Kg. This increased their income substantially.  It helped for the livelihood of SHG group through self employment. | - | - |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| Technology option 1 (Farmer’s practice) | Hand pounding | 12 | kg/hr | Rs 20/kg |  |
| Technology option 2 | Mini Rice mill | 90 | kg/hr | Rs 47/kg |  |
| Technology option 3 | - | - | - | - |  |

**C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details**

1 **Title of Technology Assessed** - Introduce Mini Rice Mill Unit

2 **Problem Definition** - The hullers are low capacity mills. In these, shelling and polishing operations are carried out simultaneously. Hence there is no control on the polishing of rice, bran and a higher breakage of rice occurs. To overcome this entire problems mini rice mill was designed to meet the needs of the villagers and a substitute for a huller mill.

3 **Details of technologies selected for assessment** - Hand pounding of paddy in a mortar with a pestle is the traditional milling process in remote villages. Pounding the paddy induces upward and downward forces on grain against grain that removes the husk and bran layers. The pounding also break up fissured grain. The final cleaning is by winnowing in a woven bamboo tray. The winnowing process to separate un milled paddy grains.

4 **Source of technology** – Padgilwar Industry Pune

5 **Production system and thematic area -** Small Scale Income Generation Enterprises

6 **Performance of the Technology with performance indicators -** 151 quintal rice was processed in a two months with the help of portable rice mill. In that process 81 quintal rice and 70 quintal husk they received. Husk was sold in Rs.5 so 35500/- Rs. Profit in only two months.

7. **Feedback, matrix scoring of various technology parameters done through farmer’s participation / other scoring techniques** –

It saved time and money of hundreds of tribal farmers. Nearby 3 villages farmers were benefitted.

Framers could sale their cleaned rice for Rs. 42 per Kg which was sold earlier at Rs.20 per Kg. This increased their income substantially.

It helped for the livelihood of SHG group through self employment.

8 **Final recommendation for micro level situation –** Mini rice mill should be adopted

9 **Constraints identified and feedback for research –** Electricity problem in rural area, manpower training

10 **Process of farmers participation and their reaction –** Tribal area, no provision of processing unit, active SHG. This increased their income substantially.

**OFT- 8**

**Results of On Farm Trial**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop/ enterprise | Farming situation | **Problem definition** | Title of OFT | No. of  trials | Technology Assessed | Parameters of assessment | Data on the parameter | Results of assessment | Feedback from the farmer | Any refinement needed | Justification for refinement |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| Poultry | Backyard Poultry | Lack of Income generating activities to Small farmers | To compare the Performance of Desi and Improved desi birds in backyard system. | 10 | T1 : Rearing of Desi birds | 1. Weight gain in 10 wks    2. % change in parameter  3. B:C ratio | Average wt. 488.18 gm  - | Giriraja and Kadaknath birds are adapted in local situations. Giriraja birds are producing almost double weights than local ones while Kadaknath birds are also producing more weight comparatively local ones. | Farmers are selling these birds in 2-3 months age and getting higher amount due to higher weights. For eggs productions also these birds are proving superior to local ones. Farmers are happy by getting more weight gain in small period which leads to more profit. | - | - |
|  |  |  |  |  | T2 : Rearing of Giriraja birds | 1. Weight gain in 10 wks    2. % change in parameter | Average wt. 928.32 gm  83.26 |
|  |  |  |  |  | T3 : Rearing of Kadaknath birds | 1. Weight gain in 10 wks    2. % change in parameter | Average wt. 593.11gm  41.62 |

**Contd..**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Technology Assessed | Source of Technology | Production | Please give the unit (kg/ha, t/ha, lit/animal, nuts/palm, nuts/palm/year) | Net Return (Profit) in Rs. / unit | BC Ratio |
| 13 | 14 | 15 | 16 | 17 | 18 |
| Desi birds in backyard system |  | Average wt. 488.18 gm | gm/10 wks of age | 53 | 1.39 |
| Giriraja birds in backyard system |  | Average wt. 928.32 gm | gm/10 wks of age | 124 | 2.88 |
| Kadaknath birds in backyard system |  | Average wt. 593.11 gm | gm/10 wks of age | 91 | 1.42 |

**C2. Details of each On Farm Trial for assessment to be furnished in the following format separately as per the following details**

1 Title of Technology Assessed - To compare the Performance of Desi and Improved desi birds with its adaptation in backyard system.

2 Problem Definition - Lack of Income generating activities to Small farmers

3 Details of technologies selected for assessment - Rearing of Giriraja & Kadaknath birds for 10 weeks age

4 Source of technology - CPDO

5 Production system and thematic area - Poultry Management

6 Performance of the Technology with performance indicators - T1 - Farmers Practice - Rearing of Desi birds

T2  - Rearing of Giriraja birds

T3 - Rearing of Kadaknath birds

7. Feedback, matrix scoring of various technology parameters done through farmer’s participation / other scoring

techniques

8 Final recommendation for micro level situation - Giriraja birds given more weight gains in same rearing systems.

9 Constraints identified and feedback for research - Crossbreeding in backyard system was the major constraint

10 Process of farmers participation and their reaction - Farmers are happy by getting more weight gain in small period which leads to more profit.

**D1. Results of Technologies Refined**

**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 2016-17 and recommended for large scale adoption in the district

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| S. No | 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 | Soybean | Seed production | Variety- MACS-1188 | Cluster Front Line Demonstration | 2 | 150 | 60 |
| 2 | Onion | Crop Production | NHRDF RED -3 | Front line demonstration | 01 | 22 | 03 |
| 3 | Garlic | Crop Production | Phule Neelima | Front line demonstration | 03 | 12 | 1.0 |
| 4 | Potato | Crop Production | Kufri Joyti | Front line demonstration | 01 | 02 | 0.8 |

B. Details of FLDs implemented during 2017-18 (Information is to be furnished in the following **three tables** for **each category** i.e. **cereals, horticultural crops, oilseeds, pulses, cotton and commercial crops**.)

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Sl.  No. | 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 |  |
| **Cereals** |  |  |  |  |  |  |  |  |  |  |
| 1 | Little Millet | ICM | Var. Phule Ekadashi | Kharif 2017 | 14 | 14 | 35 | - | 35 |  |
| 2 | Paddy | INM | Four Fold Technology | Kharif 2017 | 10 | 10 | 50 | - | 50 |  |
| 3 | Finger Millet | ICM | Var. Phule Nachani | Kharif 2017 | 20 | 20 | 50 | - | 50 |  |
| **STCR** |  |  |  |  |  |  |  |  |  |  |
| 1 | Finger millet | INM | STCR based fertilizer application | Kharif 2017 | 4 | 3.2 | 19 | - | 19 | - |
| 2 | Paddy | INM | STCR based fertilizer application | Kharif 2017 | 6 | 6 | 30 | - | 30 | - |
| **Oilseeds** |  |  |  |  |  |  |  |  |  |  |
| 1 | Soybean | Seed Production | Variety- MACS-1188 | Kharif 2017 | 50 | 50 | - | 125 | 125 | - |
| 2 | Niger | Integrated farming | Topping technology | Kharif 2017 | 20 | 5 | 10 | - | 10 | Seed not available |
| 3 | Groundnut | INM | Variety | Rabi 2017-18 | 30 | - | - | - | - | Districts have very less area under Rabi Groundnut |
| 4 | Groundnut | INM | Variety | Summer 2018 | 20 | - | - | - | - | Seed not available |
| **Pulses** |  |  |  |  |  |  |  |  |  |  |
| 1 | Chickpea | ICM | Variety- Digvijay | Rabi 2017-18 | 50 | 50 | - | 125 | 125 | - |
| **Horticultural crops** |  |  |  |  |  |  |  |  |  |  |
| 1 | Onion | Crop Production | Variety | Rabi2017 | 5 | 3 | 22 | 00 | 22 |  |
| 2 | Garlic | Crop Production | Variety | Rabi2017 | 0.04 | 1 | 12 | 02 | 14 |  |
| 3 | Potato | Crop Production | Variety | Rabi2017 | 1 | 1 | 00 | 02 | 02 |  |

Details of farming situation

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Crop | Season | Farming situation (RF/Irrigated) | Soil type | Status of soil | | | Previous crop | Sowing date | Harvest date | Seasonal rainfall (mm) | No. of rainy days |
| N | P | K |
| **Cereals** |  |  |  |  |  |  |  |  |  |  |  |
| Little Millet | Kharif | Rainfed | Medium | Low | Low | Medium | fallow | 10.07.2017 to 20.07.2017 | 10.10.2017 to 01.11.2017 | 786 | 55 |
| Paddy | Kharif | Rainfed | Medium | Low | Low | Medium | fallow | 10.06.2017 to 20.06.2017 | 06.10.2017 to 17.10.2017 | 786 | 55 |
| Finger Millet | Kharif | Rainfed | Light | Low | Low | Medium | fallow | 10.06.2017 to 20.06.2017 | 21.10.2017 to 28.10.2017 | 786 | 55 |
| **STCR** |  |  |  |  |  |  |  |  |  |  |  |
| Finger millet | Kharif2017 | Rainfed | Sloppy,light | low | low | low | fallow | July2017 | Nov 2017 | 690 | 33 |
| Paddy | Kharif2017 | Rainfed | Light to medium | low | low | low | onion | July2017 | Nov 2017 | 690 | 33 |
| **Oilseed** |  |  |  |  |  |  |  |  |  |  |  |
| Soybean | Kharif | Rainfed | Medium | Low | Low | Medium | fallow | 20.06.2017 to 20.07.2017 | 01.10.2017 to 12.10.2017 | 786 | 55 |
| Niger | Kharif | Rainfed | Light | Low | Low | Medium | fallow | 10.07.2017 to 20.07.2017 | 01.11.2017 to 12.11.2017 | 786 | 55 |
| **Pulses** |  |  |  |  |  |  |  |  |  |  |  |
| Chickpea | Rabi | Irrigated | Medium | Low | Low | Medium | Maize | 05.11.2017 to 05.12.2017 | 15.02.2018 to 20.02.2018 | 786 | 55 |
| **Horticultural crops** |  |  |  |  |  |  |  |  |  |  |  |
| Onion | Rabi 2017 | Irrigated | Medium heavy to Medium Light | Low | Medium | Medium | Tomato, Cauliflower | Second week of Nov. | Last week of March | - | - |
| Garlic | Rabi 2017 | Irrigated | Medium heavy to Medium Light | Low | Medium | Medium | Vegetables,Rice | Second week of Oct. | Last week of March | - | - |
| Potato | Rabi 2017 | Irrigated | Medium heavy to Medium Light | Low | Medium | Medium | Tomato | Second week of Dec | Second week of March | - | - |

Technical Feedback on the demonstrated technologies

|  |  |
| --- | --- |
| **S. No** | **Feed Back** |
| 1. Little Millet | KOPLM-83 is high yielding variety |
| 2. Paddy | Four fold technology gives better yield |
| 3. Finger Millet | It is erect, non-lodging variety of Finger Millet |
| 4. Soybean | It is high yielding variety |
| 5. Niger | Topping technology gives more number of flowers |
| 6. Chickpea | It is medium duration (125-130 days) variety  The grain is long slender, translucent and scented |
| 7.Onion | 1.Good attractive colour  2.Big bulb size  3. Higher yield  4. Low % of joint onion |
| 8.Garlic | 1.Good attractive colour  2.Big bulb size  3.High pungency |
| 9.Potato | 1.Big size  2.Higher yield. |

Farmers’ reactions on specific technologies

|  |  |
| --- | --- |
| **S. No** | **Feed Back** |
| 1. Little Millet | The variety Phule Ekadashi variety gives more yield than local variety |
| 2. Paddy | Use of urea-DAP briquettes was useful for enhancing growth and yield |
| 3. Finger Millet | Phule Nachani variety was non-lodging character and gives more yield |
| 4. Soybean | This variety gives better yield in rainfall situation at pod development stage |
| 5. Niger | Topping technology enhances the more number of flowers which leads higher yield |
| 6. Chickpea | The ICM technology gives better yield |
| 7. Finger Millet (STCR) | Soil test based fertilizer application increased yield |
| 8.Paddy (STCR) | Soil test based fertilizer application increased yield |
| 9.Garlic | Garlic variety Phule nileema is attractive colour with bold bulb size. Good market rate. Higher yield over to local variety. |
| 10.Onion | Onion variety agrifound light given 10-15 percent higher yield than local variety. Avarage bulb size is good. Less percentage of joint onions. |
| 11.Potato | Potato Variety Kufri Joyti Have good average bulb size, Good Attractive texture on skin. |

Extension and Training activities under FLD

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Sl.No.** | **Activity** | **No. of activities organised** | **Date** | **Number of participants** | **Remarks** |
| **Little Millet** |  |  |  |  |  |
| 1 | Field days | 01 | 03.10.2017 | 47 |  |
| 2 | Farmers Training | 01 | 20.06.2017 | 37 |  |
| 3 | Media coverage | - | - | - |  |
| 4 | Training for extension functionaries | - | - | - |  |
| **Paddy** |  |  |  |  |  |
| 1 | Field days | 01 | 03.10.2017 | 47 |  |
| 2 | Farmers Training | 02 | 21.07.2017, 17.08.2017 | 74 |  |
| 3 | Media coverage | 01 | 21.04.2017 | - |  |
| 4 | Training for extension functionaries | 01 | 17.05.2017 | 17 |  |
| **Finger Millet** |  |  |  |  |  |
| 1 | Field days | 01 | 03.10.2017 | 47 |  |
| 2 | Farmers Training | 01 | 28.07.2017 | 22 |  |
| 3 | Media coverage | - | - | - |  |
| 4 | Training for extension functionaries | - | - | - |  |
| **Soybean** |  |  |  |  |  |
| 1 | Field days | 01 | 17.09.2017 | 28 |  |
| 2 | Farmers Training | 03 | 27.06.2017, 14.07.2017, 14.08.2017 | 76 |  |
| 3 | Media coverage | - | - | - |  |
| 4 | Training for extension functionaries | 02 | 11.05.2017, 16.05.2017 | 502 |  |
| **Niger** |  |  |  |  |  |
| 1 | Field days | 01 | 03.10.2017 | 47 |  |
| 2 | Farmers Training | 01 | 08.08.2017 | 27 |  |
| 3 | Media coverage | - | - | - |  |
| 4 | Training for extension functionaries | - | - | - |  |
| **Chickpea** |  |  |  |  |  |
| 1 | Field days | 01 | 16.03.2018 | 36 |  |
| 2 | Farmers Training | 01 | 16.11.2017 | 15 |  |
| 3 | Media coverage | 01 Radio Talk | 05.10.2017 | - |  |
| 4 | Training for extension functionaries | 02 | 26.10.2017, 07.11.2017 | 65 |  |
| Garlic | Field Day | 01 | 27.03.18 | 19 |  |
| Onion | Field day | 01 | 28.03.18 | 30 |  |
| Potato | Training | 01 | 14.11.17 | 12 |  |

**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** |
| Soybean |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Seed Production | Variety | MACS-1188 | 100 | 40 | 20 | 16 | 17.98 | 14.77 | 21.73 | 33180.78 | 51801.72 | 18620.94 | 1.56 | 27253.76 | 38176.44 | 10922.67 | 1.40 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Niger |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | ICM | Topping technology | Phule Karla | 10 | 05 | 1.87 | 0.62 | 1.11 | 0.97 | 14.43 | 3060 | 5550 | 2490 | 1.81 | 2260 | 3880 | 1620 | 1.71 |

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

\*\* BCR= GROSS RETURN/GROSS COST

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** |
| Chickpea |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | ICM | Variety + ICM | Digvijay | 125 | 50 | 13.75 | 6.25 | 10.27 | 5.74 | 78.92 | 32223.6 | 46574.4 | 14350.8 | 1.44 | 19522.2 | 24287.6 | 4765.4 | 1.24 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

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

\*\* BCR= GROSS RETURN/GROSS COST

**FLD on Other crops**

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Category & Crop** | **Thematic Area** | **Name of the technology** | **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** |
| **Cereals** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| **Paddy** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | INM | Four Fold Technology | 50 | 10 | 30 | 10 | 20.34 | 15.20 | 33.82 |  |  | 19145 | 50850 | 31705 | 2.65 | 13032 | 27360 | 14328 | 2.10 |
| **Finger millet** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | ICM | Variety | 50 | 20 | 6 | 2.7 | 3.74 | 2.53 | 47.83 |  |  | 2959.5 | 10472 | 7512.5 | 3.53 | 2412 | 7084 | 4672 | 2.93 |
| **Little Millet** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | ICM | Variety | 35 | 14 | 12 | 6 | 8.98 | 5.47 | 56.86 |  |  | 11360 | 19964 | 8604 | 1.76 | 9485 | 12581 | 3096 | 1.32 |
| **Finger millet** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | INM | STCR technology | 19 | 4 | 4.65 | 3.80 | 4.02 | 2.56 | 57.03 | - | - | 7295.26 | 10854 | 3558.74 | 1.49 | 4736.84 | 5632 | 895.16 | 1.19 |
| **Paddy** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | INM | STCR technology | 30 | 6 | 45 | 12.5 | 26.32 | 16.2 | 62.46 | - | - | 33291.67 | 52633.33 | 19341.67 | 1.58 | 23850 | 32400 | 8550 | 1.36 |
| **Vegetable** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| **Onion** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Crop Production | Variety | 22 | 03 | 250 | 145 | 190 | 165 | 15.15 | - | - | 27500 | 85500 | 58500 | 3.10 | 26450 | 74250 | 47800 | 2.8 |
| **Garlic** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Crop Production | Variety | 14 | 1 | 92 | 62 | 82 | 67 | 22.39 | - | - | 16750 | 49200 | 32450 | 2.93 | 12650 | 30150 | 17500 | 2.38 |
| **Potato** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | **Crop Production** | Variety | 02 | 1 | 150 | 120 | 140 | 120 | 16.67 | - | - | 45000 | 120000 | 77800 | 2.66 | 42000 | 79000 | 37000 | 1.88 |

FLD on Livestock

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Category** | **Thematic area** | **Name of the technology demonstrated** | **No. of Farmer** | **No.of Units (Animal/ Poultry/ Birds, etc)** | **Major parameters** | | **%**  **change**  **in major**  **parameter** | **Other parameter** | | **Economics of demonstration (Rs.)** | | | | **Economics of check**  **(Rs.)** | | | |
| **Demo** | **Check** | **Demo** | **Check** | **Gross**  **Cost** | **Gross**  **Return** | **Net**  **Return** | **BCR**  **(R/C)** | **Gross**  **Cost** | **Gross**  **Return** | **Net**  **Return** | **BCR**  **(R/C)** |
| **Cattle** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Feed management | Improved fodder variety - Gunwant | 11 | 1200 | ql/ha | ql/ha | 80.16 | - | - | 28140 | 144718 | 141904 | 5.14 | 2502 | 87666 | 85164 | 35.03 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| **Poultry** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Poultry farming | Improved Giriraja breed for free range | 40 | 400 | Yield, B:C ratio | Yield, B:C ratio | 88.87 | Cost of Cultivation, Gross Income | Cost of Cultivation, Gross Income | 46 | 205 | 159 | 4.45 | 33 | 107 | 74 | 3.24 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| **Sheep & Goat** |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Goat farming | Pure Osmanabadi goats for upgradation of local breed | 02 | 02 | Yield, B:C ratio | Yield, B:C ratio | 62.28 | Cost of Cultivation, Gross Income | Cost of Cultivation, Gross Income | 2814 | 6017 | 3203 | 2.14 | 2626 | 4588 | 1962 | 1.74 |

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

\*\* BCR= GROSS RETURN/GROSS COST

FLD on Women Empowerment

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Category | Name of technology | No. of demonstrations | Name of observations | Demonstration | Check |
| Super Grain Bag | Super Grain Bags to prevent store grain pests during storage | 25 | 1. Percentage of grain damage  2. Shelf life of grain | 5 %  Increase | 26%  Decrease |
| Okra Mitten | Okra | 25 | 1.Harvesting per day / women (kg)  2. Number 0f scratches on fingers | 62  Nill | 35  More |
|  |  |  |  |  |  |

**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 preparation** | **Sowing** | **Weeding** | **Total** | **Land preparation** | **Labour** | **Irrigation** | **Total** |
| Vertical conveyor reaper | paddy | Merchandised Harvesting of paddy for marginal farmers | 10 | 04 | Labour (nos.) | 2.00 | 6.00 | (-66.67%) | 03 | - | - | 03 |  |  |  |  |
|  |  |  |  |  | Time (days/ha) | 0.52 | 1.61 | (-67.71%) |  |  |  |  |  |  |  |  |
|  |  |  |  |  | Output (ha/day) | 1.92 | 0.62 | (+209.68%) |  |  |  |  |  |  |  |  |
|  |  |  |  |  | Cost (Rs./ha) | 856.00 | 1935.48 | (-55.77%) |  |  |  |  | Rs.1079.48/ha |  |  | Rs.1079.48/ha |
|  |  |  |  |  | drudgery | V. low | high | Very low |  |  |  |  |  |  |  |  |
| Motorised Groundnut strippper | Groundnut | Motorised Groundnut strippper @Sarul Tal. Nasihk | 12 | 04 | Labour (nos.) | 2.00 | 10.00 | (-80%) |  |  |  |  |  |  |  |  |
|  |  |  |  |  | Time (days/qtl) | 0.19 | 5.00 | (-96.15%) |  |  |  |  |  |  |  |  |
|  |  |  |  |  | Output (Qtl/day) | 5.20 | 0.20 | (+96%) |  |  |  |  |  |  |  |  |
|  |  |  |  |  | Cost (Rs./Qtl) | 102.00 | 1000.00 | (-89.80%) |  |  |  |  | Rs.898/ Qtl |  |  | Rs.898/ Qtl |
|  |  |  |  |  | drudgery | low | high | Very Low |  |  |  |  |  |  |  |  |
| IWRAS, MPKV  Mobile app | Veg, fruit crops | Phule Jal -Mobile irrigation advisory |  |  | App under modifn |  |  |  |  |  |  |  |  |  |  |  |
| Cono weeder | Rice | Cono weeder for paddy interculturing | 10 | 2 ha | Area covered by weeding /day | 1 ha | 0.5 ha | 50% |  |  |  |  |  |  |  |  |
|  |  |  |  |  | Cost of operation Rs/ha | 400 | 800 | (-) 50.00 |  |  |  |  |  |  |  |  |
|  |  |  |  |  | Man days/ha | 1 | 2 | 50% |  |  |  |  |  |  |  |  |

Note :

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  |  |  |  | Reaper | Gnut strippper |
| a | cost of the machine |  |  | 115000 | 20000 |
| b | recovery périod |  |  | 5 | 5 |
| c | cost per year (a/b) |  |  | 23000 | 4000 |
| d | maintenance cost (10 % of c) |  |  | 2300 | 400 |
| e | total cost of dep.+maint per year (c+d) |  |  | 25300 | 4400 |
| f | average area in ha / qtl covered per year |  |  | 50 | 100 |
| g | average cost of machine per ha (e/f) |  |  | 506 | 44 |
| h | Oper cost { Reaper : (Rs.200 for skilled labour +Rs.500 for fuel, etc.=700 for 2 ha/day =350 per ha for reaper) } |  |  | 350 |  |
| h | Oper cost { Stripper: (Rs.100 x 2 labour +Rs.100 for electricity, etc.=300 for 520 kg/d =Rs.0.58/ kg or 58 /qtl) |  |  |  | 58 |
|  | Total cost/ha (machine cost +dpr+operational)(g+h) |  |  | 856 | 102 |

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** |  |  |  |  |  |  |  |  |  |  |
| Weed Management | 1 | 120 | 0 | 120 | 0 | 0 | 0 | 120 | 0 | 120 |
| Resource Conservation Technologies |  |  |  |  |  |  |  |  |  |  |
| Cropping Systems |  |  |  |  |  |  |  |  |  |  |
| Crop Diversification |  |  |  |  |  |  |  |  |  |  |
| Integrated Farming |  |  |  |  |  |  |  |  |  |  |
| Micro Irrigation/irrigation |  |  |  |  |  |  |  |  |  |  |
| Seed production |  |  |  |  |  |  |  |  |  |  |
| Nursery management | 2 | 10 | 5 | 15 | 10 | 16 | 26 | 20 | 21 | 41 |
| Integrated Crop Management |  |  |  |  |  |  |  |  |  |  |
| Soil & water conservatioin |  |  |  |  |  |  |  |  |  |  |
| Integrated nutrient management |  |  |  |  |  |  |  |  |  |  |
| Production of organic inputs | 1 | 19 | 6 | 25 | 4 | 0 | 4 | 23 | 6 | 29 |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **II Horticulture** |  |  |  |  |  |  |  |  |  |  |
| **a) Vegetable Crops** |  |  |  |  |  |  |  |  |  |  |
| Production of low value and high valume crops |  |  |  |  |  |  |  |  |  |  |
| Off-season vegetables |  |  |  |  |  |  |  |  |  |  |
| Nursery raising |  |  |  |  |  |  |  |  |  |  |
| Exotic vegetables |  |  |  |  |  |  |  |  |  |  |
| Export potential vegetables | 2 | 31 | 0 | 31 | 43 | 0 | 43 | 74 | 0 | 74 |
| Grading and standardization |  |  |  |  |  |  |  |  |  |  |
| Protective cultivation |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Post Harvest Management | 1 | 5 | 15 | 20 | 7 | 20 | 27 | 12 | 35 | 47 |
| **Total (a)** |  |  |  |  |  |  |  |  |  |  |
| **b) Fruits** |  |  |  |  |  |  |  |  |  |  |
| Training and Pruning |  |  |  |  |  |  |  |  |  |  |
| Layout and Management of Orchards |  |  |  |  |  |  |  |  |  |  |
| Cultivation of Fruit |  |  |  |  |  |  |  |  |  |  |
| Management of young plants/orchards |  |  |  |  |  |  |  |  |  |  |
| Rejuvenation of old orchards |  |  |  |  |  |  |  |  |  |  |
| Export potential fruits |  |  |  |  |  |  |  |  |  |  |
| Micro irrigation systems of orchards |  |  |  |  |  |  |  |  |  |  |
| Plant propagation techniques |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (b)** |  |  |  |  |  |  |  |  |  |  |
| **c) Ornamental Plants** |  |  |  |  |  |  |  |  |  |  |
| Nursery Management |  |  |  |  |  |  |  |  |  |  |
| Management of potted plants |  |  |  |  |  |  |  |  |  |  |
| Export potential of ornamental plants |  |  |  |  |  |  |  |  |  |  |
| Propagation techniques of Ornamental Plants |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total ( c)** |  |  |  |  |  |  |  |  |  |  |
| **d) Plantation crops** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (d)** |  |  |  |  |  |  |  |  |  |  |
| **e) Tuber crops** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition | 1 | 0 | 10 | 10 | 0 | 7 | 7 | 0 | 17 | 17 |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (e)** |  |  |  |  |  |  |  |  |  |  |
| **f) Spices** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (f)** |  |  |  |  |  |  |  |  |  |  |
| **g) Medicinal and Aromatic Plants** |  |  |  |  |  |  |  |  |  |  |
| Nursery management |  |  |  |  |  |  |  |  |  |  |
| Production and management technology |  |  |  |  |  |  |  |  |  |  |
| Post harvest technology and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (g)** |  |  |  |  |  |  |  |  |  |  |
| **GT (a-g)** |  |  |  |  |  |  |  |  |  |  |
| **III Soil Health and Fertility Management** |  |  |  |  |  |  |  |  |  |  |
| Soil fertility management |  |  |  |  |  |  |  |  |  |  |
| Integrated water management |  |  |  |  |  |  |  |  |  |  |
| Integrated Nutrient Management | 1 | 30 | 0 | 30 | 5 | 0 | 5 | 35 | 0 | 35 |
| Production and use of organic inputs |  |  |  |  |  |  |  |  |  |  |
| Management of Problematic soils |  |  |  |  |  |  |  |  |  |  |
| Micro nutrient deficiency in crops |  |  |  |  |  |  |  |  |  |  |
| Nutrient Use Efficiency |  |  |  |  |  |  |  |  |  |  |
| Balance use of fertilizers |  |  |  |  |  |  |  |  |  |  |
| Soil and Water Testing |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **IV Livestock Production and Management** |  |  |  |  |  |  |  |  |  |  |
| Dairy Management |  |  |  |  |  |  |  |  |  |  |
| Poultry Management |  |  |  |  |  |  |  |  |  |  |
| Piggery Management |  |  |  |  |  |  |  |  |  |  |
| Rabbit Management |  |  |  |  |  |  |  |  |  |  |
| Animal Nutrition Management |  |  |  |  |  |  |  |  |  |  |
| Disease Management |  |  |  |  |  |  |  |  |  |  |
| Feed & fodder technology |  |  |  |  |  |  |  |  |  |  |
| Production of quality animal products |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Feed management | 1 | 23 | 0 | 23 | 17 | 0 | 17 | 40 | 0 | 40 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **V Home Science/Women empowerment** |  |  |  |  |  |  |  |  |  |  |
| Household food security by kitchen gardening and nutrition gardening |  |  |  |  |  |  |  |  |  |  |
| Design and development of low/minimum cost diet |  |  |  |  |  |  |  |  |  |  |
| Designing and development for high nutrient efficiency diet |  |  |  |  |  |  |  |  |  |  |
| Minimization of nutrient loss in processing |  |  |  |  |  |  |  |  |  |  |
| Processing and cooking |  |  |  |  |  |  |  |  |  |  |
| Gender mainstreaming through SHGs |  |  |  |  |  |  |  |  |  |  |
| Storage loss minimization techniques |  |  |  |  |  |  |  |  |  |  |
| Value addition | 3 | 14 | 24 | 38 | 2 | 25 | 27 | 16 | 49 | 65 |
| Women empowerment |  |  |  |  |  |  |  |  |  |  |
| Location specific drudgery reduction technologies |  |  |  |  |  |  |  |  |  |  |
| Rural Crafts |  |  |  |  |  |  |  |  |  |  |
| Women and child care |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VI Agril. Engineering** |  |  |  |  |  |  |  |  |  |  |
| Farm Machinary and its maintenance |  |  |  |  |  |  |  |  |  |  |
| Installation and maintenance of micro irrigation systems |  |  |  |  |  |  |  |  |  |  |
| Use of Plastics in farming practices |  |  |  |  |  |  |  |  |  |  |
| Production of small tools and implements |  |  |  |  |  |  |  |  |  |  |
| Repair and maintenance of farm machinery and implements |  |  |  |  |  |  |  |  |  |  |
| Small scale processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Post Harvest Technology |  |  |  |  |  |  |  |  |  |  |
| **Others (pl specify)** |  |  |  |  |  |  |  |  |  |  |
| Agril Mech. | 1 | 0 | 0 | 0 | 18 | 0 | 18 | 18 | 0 | 18 |
| Protected Cultivation | 1 | 6 | 0 | 6 | 8 | 0 | 8 | 14 | 0 | 14 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VII Plant Protection** |  |  |  |  |  |  |  |  |  |  |
| Integrated Pest Management | 4 | 160 | 3 | 163 | 10 | 0 | 10 | 170 | 3 | 173 |
| Integrated Disease Management |  |  |  |  |  |  |  |  |  |  |
| Bio-control of pests and diseases |  |  |  |  |  |  |  |  |  |  |
| Production of bio control agents and bio pesticides |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VIII Fisheries** |  |  |  |  |  |  |  |  |  |  |
| Integrated fish farming |  |  |  |  |  |  |  |  |  |  |
| Carp breeding and hatchery management |  |  |  |  |  |  |  |  |  |  |
| Carp fry and fingerling rearing |  |  |  |  |  |  |  |  |  |  |
| Composite fish culture |  |  |  |  |  |  |  |  |  |  |
| Hatchery management and culture of freshwater prawn |  |  |  |  |  |  |  |  |  |  |
| Breeding and culture of ornamental fishes |  |  |  |  |  |  |  |  |  |  |
| Portable plastic carp hatchery |  |  |  |  |  |  |  |  |  |  |
| Pen culture of fish and prawn |  |  |  |  |  |  |  |  |  |  |
| Shrimp farming |  |  |  |  |  |  |  |  |  |  |
| Edible oyster farming |  |  |  |  |  |  |  |  |  |  |
| Pearl culture |  |  |  |  |  |  |  |  |  |  |
| Fish processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **IX Production of Inputs at site** |  |  |  |  |  |  |  |  |  |  |
| Seed Production |  |  |  |  |  |  |  |  |  |  |
| Planting material production |  |  |  |  |  |  |  |  |  |  |
| Bio-agents production |  |  |  |  |  |  |  |  |  |  |
| Bio-pesticides production |  |  |  |  |  |  |  |  |  |  |
| Bio-fertilizer production |  |  |  |  |  |  |  |  |  |  |
| Vermi-compost production |  |  |  |  |  |  |  |  |  |  |
| Organic manures production |  |  |  |  |  |  |  |  |  |  |
| Production of fry and fingerlings |  |  |  |  |  |  |  |  |  |  |
| Production of Bee-colonies and wax sheets |  |  |  |  |  |  |  |  |  |  |
| Small tools and implements |  |  |  |  |  |  |  |  |  |  |
| Production of livestock feed and fodder |  |  |  |  |  |  |  |  |  |  |
| Production of Fish feed |  |  |  |  |  |  |  |  |  |  |
| Mushroom Production |  |  |  |  |  |  |  |  |  |  |
| Apiculture |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **X CapacityBuilding and Group Dynamics** |  |  |  |  |  |  |  |  |  |  |
| Leadership development |  |  |  |  |  |  |  |  |  |  |
| Group dynamics |  |  |  |  |  |  |  |  |  |  |
| Formation and Management of SHGs |  |  |  |  |  |  |  |  |  |  |
| Mobilization of social capital |  |  |  |  |  |  |  |  |  |  |
| Entrepreneurial development of farmers/youths |  |  |  |  |  |  |  |  |  |  |
| WTO and IPR issues |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Para Extension Workers | 1 | 34 | 0 | 34 | 16 | 0 | 16 | 50 | 0 | 50 |
|  |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **XI Agro-forestry** |  |  |  |  |  |  |  |  |  |  |
| Production technologies |  |  |  |  |  |  |  |  |  |  |
| Nursery management |  |  |  |  |  |  |  |  |  |  |
| Integrated Farming Systems |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **GRAND TOTAL** |  |  |  |  |  |  |  |  |  |  |

**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** |  |  |  |  |  |  |  |  |  |  |
| Weed Management |  |  |  |  |  |  |  |  |  |  |
| Resource Conservation Technologies |  |  |  |  |  |  |  |  |  |  |
| Cropping Systems |  |  |  |  |  |  |  |  |  |  |
| Crop Diversification | 1 | 30 | 0 | 30 | 0 | 0 | 0 | 30 | 0 | 30 |
| Integrated Farming | 1 | 0 | 0 | 0 | 22 | 0 | 22 | 22 | 0 | 22 |
| Micro Irrigation/irrigation |  |  |  |  |  |  |  |  |  |  |
| Seed production |  |  |  |  |  |  |  |  |  |  |
| Nursery management | 1 | 12 | 2 | 14 | 0 | 0 | 0 | 12 | 2 | 14 |
| Integrated Crop Management | 8 | 60 | 2 | 62 | 142 | 14 | 156 | 202 | 16 | 218 |
| Soil & water conservatioin |  |  |  |  |  |  |  |  |  |  |
| Integrated nutrient management |  |  |  |  |  |  |  |  |  |  |
| Production of organic inputs |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **II Horticulture** |  |  |  |  |  |  |  |  |  |  |
| **a) Vegetable Crops** |  |  |  |  |  |  |  |  |  |  |
| Production of low value and high valume crops |  |  |  |  |  |  |  |  |  |  |
| Off-season vegetables |  |  |  |  |  |  |  |  |  |  |
| Nursery raising |  |  |  |  |  |  |  |  |  |  |
| Exotic vegetables |  |  |  |  |  |  |  |  |  |  |
| Export potential vegetables | 4 | 58 | 0 | 58 | 29 | 0 | 29 | 87 | 0 | 87 |
| Grading and standardization |  |  |  |  |  |  |  |  |  |  |
| Protective cultivation |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (a)** |  |  |  |  |  |  |  |  |  |  |
| **b) Fruits** |  |  |  |  |  |  |  |  |  |  |
| Training and Pruning |  |  |  |  |  |  |  |  |  |  |
| Layout and Management of Orchards |  |  |  |  |  |  |  |  |  |  |
| Cultivation of Fruit | 2 | 65 | 20 | 85 | 12 | 4 | 16 | 77 | 24 | 101 |
| Management of young plants/orchards |  |  |  |  |  |  |  |  |  |  |
| Rejuvenation of old orchards | 1 | 0 | 0 | 0 | 12 | 2 | 14 | 12 | 2 | 14 |
| Export potential fruits |  |  |  |  |  |  |  |  |  |  |
| Micro irrigation systems of orchards |  |  |  |  |  |  |  |  |  |  |
| Plant propagation techniques |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (b)** |  |  |  |  |  |  |  |  |  |  |
| **c) Ornamental Plants** |  |  |  |  |  |  |  |  |  |  |
| Nursery Management |  |  |  |  |  |  |  |  |  |  |
| Management of potted plants |  |  |  |  |  |  |  |  |  |  |
| Export potential of ornamental plants |  |  |  |  |  |  |  |  |  |  |
| Propagation techniques of Ornamental Plants |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total ( c)** |  |  |  |  |  |  |  |  |  |  |
| **d) Plantation crops** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (d)** |  |  |  |  |  |  |  |  |  |  |
| **e) Tuber crops** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (e)** |  |  |  |  |  |  |  |  |  |  |
| **f) Spices** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (f)** |  |  |  |  |  |  |  |  |  |  |
| **g) Medicinal and Aromatic Plants** |  |  |  |  |  |  |  |  |  |  |
| Nursery management |  |  |  |  |  |  |  |  |  |  |
| Production and management technology |  |  |  |  |  |  |  |  |  |  |
| Post harvest technology and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (g)** |  |  |  |  |  |  |  |  |  |  |
| **GT (a-g)** |  |  |  |  |  |  |  |  |  |  |
| **III Soil Health and Fertility Management** |  |  |  |  |  |  |  |  |  |  |
| Soil fertility management |  |  |  |  |  |  |  |  |  |  |
| Integrated water management |  |  |  |  |  |  |  |  |  |  |
| Integrated Nutrient Management | 5 | 80 | 0 | 80 | 61 | 5 | 66 | 141 | 5 | 146 |
| Production and use of organic inputs |  |  |  |  |  |  |  |  |  |  |
| Management of Problematic soils |  |  |  |  |  |  |  |  |  |  |
| Micro nutrient deficiency in crops |  |  |  |  |  |  |  |  |  |  |
| Nutrient Use Efficiency |  |  |  |  |  |  |  |  |  |  |
| Balance use of fertilizers |  |  |  |  |  |  |  |  |  |  |
| Soil and Water Testing |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **IV Livestock Production and Management** |  |  |  |  |  |  |  |  |  |  |
| Dairy Management | 6 | 29 | 6 | 35 | 35 | 24 | 59 | 64 | 30 | 94 |
| Poultry Management | 4 | 31 | 12 | 43 | 23 | 21 | 44 | 54 | 33 | 87 |
| Piggery Management |  |  |  |  |  |  |  |  |  |  |
| Rabbit Management |  |  |  |  |  |  |  |  |  |  |
| Animal Nutrition Management |  |  |  |  |  |  |  |  |  |  |
| Disease Management | 2 | 9 | 2 | 11 | 11 | 19 | 30 | 20 | 21 | 41 |
| Feed & fodder technology |  |  |  |  |  |  |  |  |  |  |
| Production of quality animal products |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Feed management | 3 | 29 | 7 | 36 | 32 | 7 | 39 | 61 | 14 | 75 |
| Goat Management | 5 | 57 | 11 | 68 | 55 | 13 | 68 | 112 | 24 | 136 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **V Home Science/Women empowerment** |  |  |  |  |  |  |  |  |  |  |
| Household food security by kitchen gardening and nutrition gardening | 2 | 0 | 15 | 15 | 0 | 22 | 22 | 0 | 37 | 37 |
| Design and development of low/minimum cost diet | 2 | 0 | 3 | 3 | 0 | 36 | 36 | 0 | 39 | 39 |
| Designing and development for high nutrient efficiency diet |  |  |  |  |  |  |  |  |  |  |
| Minimization of nutrient loss in processing |  |  |  |  |  |  |  |  |  |  |
| Processing and cooking |  |  |  |  |  |  |  |  |  |  |
| Gender mainstreaming through SHGs |  |  |  |  |  |  |  |  |  |  |
| Storage loss minimization techniques |  |  |  |  |  |  |  |  |  |  |
| Value addition | 7 | 24 | 28 | 52 | 27 | 86 | 113 | 51 | 114 | 165 |
| Women empowerment |  |  |  |  |  |  |  |  |  |  |
| Location specific drudgery reduction technologies | 1 | 0 | 2 | 2 | 0 | 43 | 43 | 0 | 45 | 45 |
| Rural Crafts |  |  |  |  |  |  |  |  |  |  |
| Women and child care |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Income generation activities for empowerment of rural Women | 2 | 0 | 3 | 3 | 0 | 27 | 27 | 0 | 30 | 30 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VI Agril. Engineering** |  |  |  |  |  |  |  |  |  |  |
| Farm Machinary and its maintenance |  |  |  |  |  |  |  |  |  |  |
| Installation and maintenance of micro irrigation systems |  |  |  |  |  |  |  |  |  |  |
| Use of Plastics in farming practices |  |  |  |  |  |  |  |  |  |  |
| Production of small tools and implements |  |  |  |  |  |  |  |  |  |  |
| Repair and maintenance of farm machinery and implements |  |  |  |  |  |  |  |  |  |  |
| Small scale processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Post Harvest Technology |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Agril Mech. | 1 | 0 | 11 | 11 | 0 | 5 | 5 | 0 | 16 | 16 |
| Protected Cultivation | 4 | 83 | 9 | 92 | 33 | 4 | 37 | 116 | 13 | 129 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VII Plant Protection** |  |  |  |  |  |  |  |  |  |  |
| Integrated Pest Management | 2 | 57 | 1 | 58 | 10 | 0 | 10 | 67 | 1 | 68 |
| Integrated Disease Management |  |  |  |  |  |  |  |  |  |  |
| Bio-control of pests and diseases |  |  |  |  |  |  |  |  |  |  |
| Production of bio control agents and bio pesticides |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VIII Fisheries** |  |  |  |  |  |  |  |  |  |  |
| Integrated fish farming |  |  |  |  |  |  |  |  |  |  |
| Carp breeding and hatchery management |  |  |  |  |  |  |  |  |  |  |
| Carp fry and fingerling rearing |  |  |  |  |  |  |  |  |  |  |
| Composite fish culture |  |  |  |  |  |  |  |  |  |  |
| Hatchery management and culture of freshwater prawn |  |  |  |  |  |  |  |  |  |  |
| Breeding and culture of ornamental fishes |  |  |  |  |  |  |  |  |  |  |
| Portable plastic carp hatchery |  |  |  |  |  |  |  |  |  |  |
| Pen culture of fish and prawn |  |  |  |  |  |  |  |  |  |  |
| Shrimp farming |  |  |  |  |  |  |  |  |  |  |
| Edible oyster farming |  |  |  |  |  |  |  |  |  |  |
| Pearl culture |  |  |  |  |  |  |  |  |  |  |
| Fish processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **IX Production of Inputs at site** |  |  |  |  |  |  |  |  |  |  |
| Seed Production |  |  |  |  |  |  |  |  |  |  |
| Planting material production |  |  |  |  |  |  |  |  |  |  |
| Bio-agents production |  |  |  |  |  |  |  |  |  |  |
| Bio-pesticides production |  |  |  |  |  |  |  |  |  |  |
| Bio-fertilizer production |  |  |  |  |  |  |  |  |  |  |
| Vermi-compost production | 1 | 0 | 0 | 0 | 36 | 0 | 36 | 36 | 0 | 36 |
| Organic manures production |  |  |  |  |  |  |  |  |  |  |
| Production of fry and fingerlings |  |  |  |  |  |  |  |  |  |  |
| Production of Bee-colonies and wax sheets |  |  |  |  |  |  |  |  |  |  |
| Small tools and implements |  |  |  |  |  |  |  |  |  |  |
| Production of livestock feed and fodder |  |  |  |  |  |  |  |  |  |  |
| Production of Fish feed |  |  |  |  |  |  |  |  |  |  |
| Mushroom Production |  |  |  |  |  |  |  |  |  |  |
| Apiculture |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **X Capacity Building and Group Dynamics** |  |  |  |  |  |  |  |  |  |  |
| Leadership development |  |  |  |  |  |  |  |  |  |  |
| Group dynamics |  |  |  |  |  |  |  |  |  |  |
| Formation and Management of SHGs |  |  |  |  |  |  |  |  |  |  |
| Mobilization of social capital |  |  |  |  |  |  |  |  |  |  |
| Entrepreneurial development of farmers/youths |  |  |  |  |  |  |  |  |  |  |
| WTO and IPR issues |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **XI Agro-forestry** |  |  |  |  |  |  |  |  |  |  |
| Production technologies |  |  |  |  |  |  |  |  |  |  |
| Nursery management |  |  |  |  |  |  |  |  |  |  |
| Integrated Farming Systems |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **GRAND TOTAL** |  |  |  |  |  |  |  |  |  |  |

**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** |  |  |  |  |  |  |  |  |  |  |
| Weed Management | 1 | 120 | 0 | 120 | 0 | 0 | 0 | 120 | 0 | 120 |
| Resource Conservation Technologies |  |  |  |  |  |  |  |  |  |  |
| Cropping Systems |  |  |  |  |  |  |  |  |  |  |
| Crop Diversification | 1 | 30 | 0 | 30 | 0 | 0 | 0 | 30 | 0 | 30 |
| Integrated Farming | 1 | 0 | 0 | 0 | 22 | 0 | 22 | 22 | 0 | 22 |
| Micro Irrigation/irrigation |  |  |  |  |  |  |  |  |  |  |
| Seed production |  |  |  |  |  |  |  |  |  |  |
| Nursery management | 3 | 22 | 7 | 29 | 10 | 16 | 26 | 32 | 23 | 55 |
| Integrated Crop Management | 8 | 60 | 2 | 62 | 142 | 14 | 156 | 202 | 16 | 218 |
| Soil & water conservatioin |  |  |  |  |  |  |  |  |  |  |
| Integrated nutrient management |  |  |  |  |  |  |  |  |  |  |
| Production of organic inputs | 1 | 19 | 6 | 25 | 4 | 0 | 4 | 23 | 6 | 29 |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **II Horticulture** |  |  |  |  |  |  |  |  |  |  |
| **a) Vegetable Crops** |  |  |  |  |  |  |  |  |  |  |
| Production of low value and high valume crops |  |  |  |  |  |  |  |  |  |  |
| Off-season vegetables |  |  |  |  |  |  |  |  |  |  |
| Nursery raising |  |  |  |  |  |  |  |  |  |  |
| Exotic vegetables |  |  |  |  |  |  |  |  |  |  |
| Export potential vegetables | 6 | 89 | 0 | 89 | 72 | 0 | 72 | 161 | 0 | 161 |
| Grading and standardization |  |  |  |  |  |  |  |  |  |  |
| Protective cultivation |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Post Harvest Management | 1 | 5 | 15 | 20 | 7 | 20 | 27 | 12 | 35 | 47 |
| **Total (a)** |  |  |  |  |  |  |  |  |  |  |
| **b) Fruits** |  |  |  |  |  |  |  |  |  |  |
| Training and Pruning |  |  |  |  |  |  |  |  |  |  |
| Layout and Management of Orchards |  |  |  |  |  |  |  |  |  |  |
| Cultivation of Fruit | 2 | 65 | 20 | 85 | 12 | 4 | 16 | 77 | 24 | 101 |
| Management of young plants/orchards |  |  |  |  |  |  |  |  |  |  |
| Rejuvenation of old orchards | 1 | 0 | 0 | 0 | 12 | 2 | 14 | 12 | 2 | 14 |
| Export potential fruits |  |  |  |  |  |  |  |  |  |  |
| Micro irrigation systems of orchards |  |  |  |  |  |  |  |  |  |  |
| Plant propagation techniques |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (b)** |  |  |  |  |  |  |  |  |  |  |
| **c) Ornamental Plants** |  |  |  |  |  |  |  |  |  |  |
| Nursery Management |  |  |  |  |  |  |  |  |  |  |
| Management of potted plants |  |  |  |  |  |  |  |  |  |  |
| Export potential of ornamental plants |  |  |  |  |  |  |  |  |  |  |
| Propagation techniques of Ornamental Plants |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total ( c)** |  |  |  |  |  |  |  |  |  |  |
| **d) Plantation crops** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (d)** |  |  |  |  |  |  |  |  |  |  |
| **e) Tuber crops** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition | 1 | 0 | 10 | 10 | 0 | 7 | 7 | 0 | 17 | 17 |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (e)** |  |  |  |  |  |  |  |  |  |  |
| **f) Spices** |  |  |  |  |  |  |  |  |  |  |
| Production and Management technology |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (f)** |  |  |  |  |  |  |  |  |  |  |
| **g) Medicinal and Aromatic Plants** |  |  |  |  |  |  |  |  |  |  |
| Nursery management |  |  |  |  |  |  |  |  |  |  |
| Production and management technology |  |  |  |  |  |  |  |  |  |  |
| Post harvest technology and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total (g)** |  |  |  |  |  |  |  |  |  |  |
| **GT (a-g)** |  |  |  |  |  |  |  |  |  |  |
| **III Soil Health and Fertility Management** |  |  |  |  |  |  |  |  |  |  |
| Soil fertility management |  |  |  |  |  |  |  |  |  |  |
| Integrated water management |  |  |  |  |  |  |  |  |  |  |
| Integrated Nutrient Management | 6 | 110 | 0 | 110 | 66 | 5 | 71 | 176 | 5 | 181 |
| Production and use of organic inputs |  |  |  |  |  |  |  |  |  |  |
| Management of Problematic soils |  |  |  |  |  |  |  |  |  |  |
| Micro nutrient deficiency in crops |  |  |  |  |  |  |  |  |  |  |
| Nutrient Use Efficiency |  |  |  |  |  |  |  |  |  |  |
| Balance use of fertilizers |  |  |  |  |  |  |  |  |  |  |
| Soil and Water Testing |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **IV Livestock Production and Management** |  |  |  |  |  |  |  |  |  |  |
| Dairy Management | 6 | 29 | 6 | 35 | 35 | 24 | 59 | 64 | 30 | 94 |
| Poultry Management | 4 | 31 | 12 | 43 | 23 | 21 | 44 | 54 | 33 | 87 |
| Piggery Management |  |  |  |  |  |  |  |  |  |  |
| Rabbit Management |  |  |  |  |  |  |  |  |  |  |
| Animal Nutrition Management |  |  |  |  |  |  |  |  |  |  |
| Disease Management | 2 | 9 | 2 | 11 | 11 | 19 | 30 | 20 | 21 | 41 |
| Feed & fodder technology |  |  |  |  |  |  |  |  |  |  |
| Production of quality animal products |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Feed management | 4 | 52 | 7 | 59 | 49 | 7 | 56 | 101 | 14 | 115 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **V Home Science/Women empowerment** |  |  |  |  |  |  |  |  |  |  |
| Household food security by kitchen gardening and nutrition gardening | 2 | 0 | 15 | 15 | 0 | 22 | 22 | 0 | 37 | 37 |
| Design and development of low/minimum cost diet | 2 | 0 | 3 | 3 | 0 | 36 | 36 | 0 | 39 | 39 |
| Designing and development for high nutrient efficiency diet |  |  |  |  |  |  |  |  |  |  |
| Minimization of nutrient loss in processing |  |  |  |  |  |  |  |  |  |  |
| Processing and cooking |  |  |  |  |  |  |  |  |  |  |
| Gender mainstreaming through SHGs |  |  |  |  |  |  |  |  |  |  |
| Storage loss minimization techniques |  |  |  |  |  |  |  |  |  |  |
| Value addition | 10 | 38 | 52 | 90 | 29 | 111 | 140 | 67 | 163 | 230 |
| Women empowerment |  |  |  |  |  |  |  |  |  |  |
| Location specific drudgery reduction technologies | 1 | 0 | 2 | 2 | 0 | 43 | 43 | 0 | 45 | 45 |
| Rural Crafts |  |  |  |  |  |  |  |  |  |  |
| Women and child care |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Income generation activities for empowerment of rural Women | 2 | 0 | 3 | 3 | 0 | 27 | 27 | 0 | 30 | 30 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VI Agril. Engineering** |  |  |  |  |  |  |  |  |  |  |
| Farm Machinary and its maintenance |  |  |  |  |  |  |  |  |  |  |
| Installation and maintenance of micro irrigation systems |  |  |  |  |  |  |  |  |  |  |
| Use of Plastics in farming practices |  |  |  |  |  |  |  |  |  |  |
| Production of small tools and implements |  |  |  |  |  |  |  |  |  |  |
| Repair and maintenance of farm machinery and implements |  |  |  |  |  |  |  |  |  |  |
| Small scale processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Post Harvest Technology |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Agril Mech. | 2 | 0 | 11 | 11 | 18 | 5 | 23 | 18 | 16 | 34 |
| Protected Cultivation | 5 | 89 | 9 | 98 | 41 | 4 | 45 | 130 | 13 | 143 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VII Plant Protection** |  |  |  |  |  |  |  |  |  |  |
| Integrated Pest Management | 6 | 217 | 4 | 221 | 20 | 0 | 20 | 237 | 4 | 241 |
| Integrated Disease Management |  |  |  |  |  |  |  |  |  |  |
| Bio-control of pests and diseases |  |  |  |  |  |  |  |  |  |  |
| Production of bio control agents and bio pesticides |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **VIII Fisheries** |  |  |  |  |  |  |  |  |  |  |
| Integrated fish farming |  |  |  |  |  |  |  |  |  |  |
| Carp breeding and hatchery management |  |  |  |  |  |  |  |  |  |  |
| Carp fry and fingerling rearing |  |  |  |  |  |  |  |  |  |  |
| Composite fish culture |  |  |  |  |  |  |  |  |  |  |
| Hatchery management and culture of freshwater prawn |  |  |  |  |  |  |  |  |  |  |
| Breeding and culture of ornamental fishes |  |  |  |  |  |  |  |  |  |  |
| Portable plastic carp hatchery |  |  |  |  |  |  |  |  |  |  |
| Pen culture of fish and prawn |  |  |  |  |  |  |  |  |  |  |
| Shrimp farming |  |  |  |  |  |  |  |  |  |  |
| Edible oyster farming |  |  |  |  |  |  |  |  |  |  |
| Pearl culture |  |  |  |  |  |  |  |  |  |  |
| Fish processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **IX Production of Inputs at site** |  |  |  |  |  |  |  |  |  |  |
| Seed Production |  |  |  |  |  |  |  |  |  |  |
| Planting material production |  |  |  |  |  |  |  |  |  |  |
| Bio-agents production |  |  |  |  |  |  |  |  |  |  |
| Bio-pesticides production |  |  |  |  |  |  |  |  |  |  |
| Bio-fertilizer production |  |  |  |  |  |  |  |  |  |  |
| Vermi-compost production | 1 | 0 | 0 | 0 | 36 | 0 | 36 | 36 | 0 | 36 |
| Organic manures production |  |  |  |  |  |  |  |  |  |  |
| Production of fry and fingerlings |  |  |  |  |  |  |  |  |  |  |
| Production of Bee-colonies and wax sheets |  |  |  |  |  |  |  |  |  |  |
| Small tools and implements |  |  |  |  |  |  |  |  |  |  |
| Production of livestock feed and fodder |  |  |  |  |  |  |  |  |  |  |
| Production of Fish feed |  |  |  |  |  |  |  |  |  |  |
| Mushroom Production |  |  |  |  |  |  |  |  |  |  |
| Apiculture |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **X CapacityBuilding and Group Dynamics** |  |  |  |  |  |  |  |  |  |  |
| Leadership development |  |  |  |  |  |  |  |  |  |  |
| Group dynamics |  |  |  |  |  |  |  |  |  |  |
| Formation and Management of SHGs |  |  |  |  |  |  |  |  |  |  |
| Mobilization of social capital |  |  |  |  |  |  |  |  |  |  |
| Entrepreneurial development of farmers/youths |  |  |  |  |  |  |  |  |  |  |
| WTO and IPR issues |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| Para Extension Workers | 1 | 34 | 0 | 34 | 16 | 0 | 16 | 50 | 0 | 50 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **XI Agro-forestry** |  |  |  |  |  |  |  |  |  |  |
| Production technologies |  |  |  |  |  |  |  |  |  |  |
| Nursery management |  |  |  |  |  |  |  |  |  |  |
| Integrated Farming Systems |  |  |  |  |  |  |  |  |  |  |
| Others (pl specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **GRAND TOTAL** |  |  |  |  |  |  |  |  |  |  |

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

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | | | | | | | | | |
| **General** | | | | | | **SC/ST** | | | | | | **Grand Total** | | | | |
| **Male** | **Female** | | **Total** | | | **Male** | | **Female** | | **Total** | | **Male** | | **Female** | | **Total** |
| Nursery Management of Horticulture crops | 1 | 10 | | 2 | | 12 | | 8 | | 0 | | 8 | | 18 | | 2 | | 20 |
| Training and pruning of orchards |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Protected cultivation of vegetable crops |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Commercial fruit production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Integrated farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Seed production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Production of organic inputs |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Planting material production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Vermi-culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Mushroom Production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Bee-keeping |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Sericulture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Repair and maintenance of farm machinery and implements |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Value addition |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Small scale processing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Post Harvest Technology |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Tailoring and Stitching |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Rural Crafts |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Production of quality animal products |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Dairying |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Sheep and goat rearing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Quail farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Piggery |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Rabbit farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Poultry production | 1 | 26 | | 0 | | 26 | | 20 | | 2 | | 22 | | 46 | | 2 | | 48 |
| Ornamental fisheries |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Composite fish culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Freshwater prawn culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Shrimp farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Pearl culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Cold water fisheries |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Fish harvest and processing technology |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Fry and fingerling rearing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Any other (pl.specify) |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Goat Management | 1 | 7 | | 0 | | 7 | | 16 | | 1 | | 17 | | 23 | | 1 | | 24 |
| Para extension workers | 4 | 74 | | 14 | | 88 | | 31 | | 9 | | 40 | | 105 | | 23 | | 128 |
| Soil Health Management | 2 | 14 | | 15 | | 29 | | 1 | | 4 | | 5 | | 15 | | 19 | | 34 |
| **TOTAL** |  |  | |  | |  |  | |  | |  | |  | |  | |  | |

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

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | | | | | | | | | |
| **General** | | | | | | **SC/ST** | | | | | | **Grand Total** | | | | |
| **Male** | **Female** | | **Total** | | | **Male** | | **Female** | | **Total** | | **Male** | | **Female** | | **Total** |
| Nursery Management of Horticulture crops |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Training and pruning of orchards |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Protected cultivation of vegetable crops |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Commercial fruit production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Integrated farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Seed production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Production of organic inputs |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Planting material production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Vermi-culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Mushroom Production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Bee-keeping |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Sericulture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Repair and maintenance of farm machinery and implements |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Value addition |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Small scale processing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Post Harvest Technology |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Tailoring and Stitching |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Rural Crafts |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Production of quality animal products |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Dairying |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Sheep and goat rearing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Quail farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Piggery |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Rabbit farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Poultry production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Ornamental fisheries |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Composite fish culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Freshwater prawn culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Shrimp farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Pearl culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Cold water fisheries |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Fish harvest and processing technology |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Fry and fingerling rearing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Any other (pl.specify) |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| **TOTAL** |  |  | |  | |  |  | |  | |  | |  | |  | |  | |

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

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | | | | | | | | | |
| **General** | | | | | | **SC/ST** | | | | | | **Grand Total** | | | | |
| **Male** | **Female** | | **Total** | | | **Male** | | **Female** | | **Total** | | **Male** | | **Female** | | **Total** |
| Nursery Management of Horticulture crops | 1 | 10 | | 2 | | 12 | | 8 | | 0 | | 8 | | 18 | | 2 | | 20 |
| Training and pruning of orchards |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Protected cultivation of vegetable crops |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Commercial fruit production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Integrated farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Seed production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Production of organic inputs |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Planting material production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Vermi-culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Mushroom Production |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Bee-keeping |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Sericulture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Repair and maintenance of farm machinery and implements |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Value addition |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Small scale processing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Post Harvest Technology |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Tailoring and Stitching |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Rural Crafts |  |  | |  | |  |  | |  | |  | |  | |  | |  | |
| Production of quality animal products |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Dairying |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Sheep and goat rearing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Quail farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Piggery |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Rabbit farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Poultry production | 1 | 26 | | 0 | | 26 | | 20 | | 2 | | 22 | | 46 | | 2 | | 48 |
| Ornamental fisheries |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Composite fish culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Freshwater prawn culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Shrimp farming |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Pearl culture |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Cold water fisheries |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Fish harvest and processing technology |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Fry and fingerling rearing |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Any other (pl.specify) |  |  | |  | |  | |  | |  | |  | |  | |  | |  |
| Goat Management | 1 | 7 | | 0 | | 7 | | 16 | | 1 | | 17 | | 23 | | 1 | | 24 |
| Para extension workers | 4 | 74 | | 14 | | 88 | | 31 | | 9 | | 40 | | 105 | | 23 | | 128 |
| Soil Health Management | 2 | 14 | | 15 | | 29 | | 1 | | 4 | | 5 | | 15 | | 19 | | 34 |
| **TOTAL** |  |  | |  | |  |  | |  | |  | |  | |  | |  | |

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

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | |
| **General** | | | **SC/ST** | | | **Grand Total** | | |
| **Male** | **Female** | **Total** | **Male** | **Female** | **Total** | **Male** | **Female** | **Total** |
| Productivity enhancement in field crops |  |  |  |  |  |  |  |  |  |  |
| Integrated Pest Management | 1 | 28 | 5 | 33 | 5 | 0 | 5 | 33 | 5 | 38 |
| Integrated Nutrient management |  |  |  |  |  |  |  |  |  |  |
| Rejuvenation of old orchards |  |  |  |  |  |  |  |  |  |  |
| Protected cultivation technology | 1 | 15 | 3 | 18 | 10 | 4 | 14 | 25 | 7 | 32 |
| Production and use of organic inputs |  |  |  |  |  |  |  |  |  |  |
| Care and maintenance of farm machinery and implements |  |  |  |  |  |  |  |  |  |  |
| Gender mainstreaming through SHGs |  |  |  |  |  |  |  |  |  |  |
| Formation and Management of SHGs |  |  |  |  |  |  |  |  |  |  |
| Women and Child care |  |  |  |  |  |  |  |  |  |  |
| Low cost and nutrient efficient diet designing |  |  |  |  |  |  |  |  |  |  |
| Group Dynamics and farmers organization |  |  |  |  |  |  |  |  |  |  |
| Information networking among farmers |  |  |  |  |  |  |  |  |  |  |
| Capacity building for ICT application |  |  |  |  |  |  |  |  |  |  |
| Management in farm animals |  |  |  |  |  |  |  |  |  |  |
| Livestock feed and fodder production |  |  |  |  |  |  |  |  |  |  |
| Household food security |  |  |  |  |  |  |  |  |  |  |
| Any other (pl.specify) |  |  |  |  |  |  |  |  |  |  |
| Horticulture Crop Production | 1 | 39 | 1 | 40 | 0 | 0 | 0 | 39 | 1 | 40 |
| Integrated Crop Management | 10 | 276 | 147 | 423 | 8 | 4 | 12 | 284 | 151 | 435 |
| Nursery Management | 1 | 15 | 2 | 17 | 5 | 1 | 6 | 20 | 3 | 23 |
| **TOTAL** |  |  |  |  |  |  |  |  |  |  |

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

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | |
| **General** | | | **SC/ST** | | | **Grand Total** | | |
| **Male** | **Female** | **Total** | **Male** | **Female** | **Total** | **Male** | **Female** | **Total** |
| Productivity enhancement in field crops | 2 | 50 | 3 | 53 | 2 | 1 | 3 | 52 | 4 | 56 |
| Integrated Pest Management |  |  |  |  |  |  |  |  |  |  |
| Integrated Nutrient management | 1 | 12 | 2 | 14 | 7 | 1 | 8 | 19 | 3 | 22 |
| Rejuvenation of old orchards |  |  |  |  |  |  |  |  |  |  |
| Protected cultivation technology | 7 | 161 | 37 | 198 | 28 | 1 | 29 | 189 | 38 | 227 |
| Production and use of organic inputs |  |  |  |  |  |  |  |  |  |  |
| Care and maintenance of farm machinery and implements |  |  |  |  |  |  |  |  |  |  |
| Gender mainstreaming through SHGs |  |  |  |  |  |  |  |  |  |  |
| Formation and Management of SHGs |  |  |  |  |  |  |  |  |  |  |
| Women and Child care |  |  |  |  |  |  |  |  |  |  |
| Low cost and nutrient efficient diet designing |  |  |  |  |  |  |  |  |  |  |
| Group Dynamics and farmers organization |  |  |  |  |  |  |  |  |  |  |
| Information networking among farmers |  |  |  |  |  |  |  |  |  |  |
| Capacity building for ICT application |  |  |  |  |  |  |  |  |  |  |
| Management in farm animals |  |  |  |  |  |  |  |  |  |  |
| Livestock feed and fodder production | 1 | 5 | 1 | 6 | 12 | 0 | 12 | 17 | 1 | 18 |
| Household food security |  |  |  |  |  |  |  |  |  |  |
| Any other (pl.specify) |  |  |  |  |  |  |  |  |  |  |
| Agril Mech. | 1 | 26 | 5 | 31 | 0 | 0 | 0 | 26 | 5 | 31 |
| Horticulture Crop Production | 2 | 41 | 2 | 43 | 4 | 3 | 7 | 45 | 5 | 50 |
| Nursery Management | 2 | 29 | 6 | 35 | 17 | 4 | 21 | 46 | 10 | 56 |
| **TOTAL** |  |  |  |  |  |  |  |  |  |  |

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

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | |
| **General** | | | **SC/ST** | | | **Grand Total** | | |
| **Male** | **Female** | **Total** | **Male** | **Female** | **Total** | **Male** | **Female** | **Total** |
| Productivity enhancement in field crops | 2 | 50 | 3 | 53 | 2 | 1 | 3 | 52 | 4 | 56 |
| Integrated Pest Management | 1 | 28 | 5 | 33 | 5 | 0 | 5 | 33 | 5 | 38 |
| Integrated Nutrient management | 1 | 12 | 2 | 14 | 7 | 1 | 8 | 19 | 3 | 22 |
| Rejuvenation of old orchards |  |  |  |  |  |  |  |  |  |  |
| Protected cultivation technology | 8 | 176 | 40 | 216 | 38 | 5 | 43 | 214 | 45 | 259 |
| Production and use of organic inputs |  |  |  |  |  |  |  |  |  |  |
| Care and maintenance of farm machinery and implements |  |  |  |  |  |  |  |  |  |  |
| Gender mainstreaming through SHGs |  |  |  |  |  |  |  |  |  |  |
| Formation and Management of SHGs |  |  |  |  |  |  |  |  |  |  |
| Women and Child care |  |  |  |  |  |  |  |  |  |  |
| Low cost and nutrient efficient diet designing |  |  |  |  |  |  |  |  |  |  |
| Group Dynamics and farmers organization |  |  |  |  |  |  |  |  |  |  |
| Information networking among farmers |  |  |  |  |  |  |  |  |  |  |
| Capacity building for ICT application |  |  |  |  |  |  |  |  |  |  |
| Management in farm animals |  |  |  |  |  |  |  |  |  |  |
| Livestock feed and fodder production | 1 | 5 | 1 | 6 | 12 | 0 | 12 | 17 | 1 | 18 |
| Household food security |  |  |  |  |  |  |  |  |  |  |
| Any other (pl.specify) |  |  |  |  |  |  |  |  |  |  |
| Agril Mech. | 1 | 26 | 5 | 31 | 0 | 0 | 0 | 26 | 5 | 31 |
| Horticulture Crop Production | 3 | 80 | 3 | 83 | 4 | 3 | 7 | 84 | 6 | 90 |
| Integrated Crop Management | 10 | 276 | 147 | 423 | 8 | 4 | 12 | 284 | 151 | 435 |
| Nursery Management | 3 | 44 | 8 | 52 | 22 | 5 | 27 | 66 | 13 | 79 |
| **TOTAL** |  |  |  |  |  |  |  |  |  |  |

Sponsored training programmes

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | |
| **General** | | | **SC/ST** | | | **Grand Total** | | |
| **Male** | **Female** | **Total** | **Male** | **Female** | **Total** | **Male** | **Female** | **Total** |
|  |  |  |  |  |  |  |  |  |  |  |
| **Crop production and management** |  |  |  |  |  |  |  |  |  |  |
| Increasing production and productivity of crops |  |  |  |  |  |  |  |  |  |  |
| Commercial production of vegetables |  |  |  |  |  |  |  |  |  |  |
| **Production and value addition** |  |  |  |  |  |  |  |  |  |  |
| Fruit Plants |  |  |  |  |  |  |  |  |  |  |
| Ornamental plants |  |  |  |  |  |  |  |  |  |  |
| Spices crops |  |  |  |  |  |  |  |  |  |  |
| Soil health and fertility management |  |  |  |  |  |  |  |  |  |  |
| Production of Inputs at site |  |  |  |  |  |  |  |  |  |  |
| Methods of protective cultivation |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Post harvest technology and value addition** |  |  |  |  |  |  |  |  |  |  |
| Processing and value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Farm machinery** |  |  |  |  |  |  |  |  |  |  |
| Farm machinery, tools and implements |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Livestock and fisheries** |  |  |  |  |  |  |  |  |  |  |
| Livestock production and management |  |  |  |  |  |  |  |  |  |  |
| Animal Nutrition Management |  |  |  |  |  |  |  |  |  |  |
| Animal Disease Management |  |  |  |  |  |  |  |  |  |  |
| Fisheries Nutrition |  |  |  |  |  |  |  |  |  |  |
| Fisheries Management |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Home Science** |  |  |  |  |  |  |  |  |  |  |
| Household nutritional security |  |  |  |  |  |  |  |  |  |  |
| Economic empowerment of women |  |  |  |  |  |  |  |  |  |  |
| Drudgery reduction of women |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Agricultural Extension** |  |  |  |  |  |  |  |  |  |  |
| CapacityBuilding and Group Dynamics |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **GRAND TOTAL** |  |  |  |  |  |  |  |  |  |  |

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

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Area of training** | **No. of**  **Courses** | **No. of Participants** | | | | | | | | |
| **General** | | | **SC/ST** | | | **Grand Total** | | |
| **Male** | **Female** | **Total** | **Male** | **Female** | **Total** | **Male** | **Female** | **Total** |
| **Crop production and management** |  |  |  |  |  |  |  |  |  |  |
| Commercial floriculture |  |  |  |  |  |  |  |  |  |  |
| Commercial fruit production |  |  |  |  |  |  |  |  |  |  |
| Commercial vegetable production |  |  |  |  |  |  |  |  |  |  |
| Integrated crop management |  |  |  |  |  |  |  |  |  |  |
| Organic farming |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Post harvest technology and value addition** |  |  |  |  |  |  |  |  |  |  |
| Value addition |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Livestock and fisheries** |  |  |  |  |  |  |  |  |  |  |
| Dairy farming |  |  |  |  |  |  |  |  |  |  |
| Composite fish culture |  |  |  |  |  |  |  |  |  |  |
| Sheep and goat rearing |  |  |  |  |  |  |  |  |  |  |
| Piggery |  |  |  |  |  |  |  |  |  |  |
| Poultry farming |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| Goat Management | 1 | 7 | 0 | 7 | 16 | 1 | 17 | 23 | 1 | 24 |
| Poultry production | 1 | 26 | 0 | 26 | 20 | 2 | 22 | 46 | 2 | 48 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Income generation activities** |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |
| Vermicomposting |  |  |  |  |  |  |  |  |  |  |
| Production of bio-agents, bio-pesticides, |  |  |  |  |  |  |  |  |  |  |
| bio-fertilizers etc. |  |  |  |  |  |  |  |  |  |  |
| Repair and maintenance of farm machinery |  |  |  |  |  |  |  |  |  |  |
| and implements |  |  |  |  |  |  |  |  |  |  |
| Rural Crafts |  |  |  |  |  |  |  |  |  |  |
| Seed production |  |  |  |  |  |  |  |  |  |  |
| Sericulture |  |  |  |  |  |  |  |  |  |  |
| Mushroom cultivation |  |  |  |  |  |  |  |  |  |  |
| Nursery, grafting etc. |  |  |  |  |  |  |  |  |  |  |
| Tailoring, stitching, embroidery, dying etc. |  |  |  |  |  |  |  |  |  |  |
| Agril. para-workers, para-vet training |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| Nursery Management of Horticulture crops | 1 | 10 | 2 | 12 | 8 | 0 | 8 | 18 | 2 | 20 |
| Para extension workers | 4 | 74 | 14 | 88 | 31 | 9 | 40 | 105 | 23 | 128 |
| Soil Health Management | 2 | 14 | 15 | 29 | 1 | 4 | 5 | 15 | 19 | 34 |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Agricultural Extension** |  |  |  |  |  |  |  |  |  |  |
| Capacity building and group dynamics |  |  |  |  |  |  |  |  |  |  |
| Others (pl. specify) |  |  |  |  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |  |  |  |  |
| **Grand Total** |  |  |  |  |  |  |  |  |  |  |

3.5. Extension Programmes

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Activities** | **No. of programmes** | **No. of farmers** | **No. of Extension Personnel** | **TOTAL** |
| Advisory Services | 20 | 946 | 14 | 960 |
| Diagnostic visits | 5 | 92 | - | 92 |
| Field Day | 9 | 283 | 14 | 297 |
| Group discussions | 2 | - | - | - |
| KisanGhosthi | - | - | - | - |
| Film Show | 4 | 94 | 4 | 98 |
| Self -help groups | 1 | 40 | - | 40 |
| KisanMela | 3 | 507 | 24 | 531 |
| Exhibition | 4 | 35 | 1 | 36 |
| Scientists' visit to farmers field | 25 | 476 | 35 | 511 |
| Plant/animal health camps | - | - | - | - |
| Farm Science Club | - | - | - | - |
| Ex-trainees Sammelan | - | - | - | - |
| Farmers' seminar/workshop | 11 | 40 | 520 | 560 |
| Method Demonstrations | 8 | 233 | 4 | 237 |
| Celebration of important days | 6 | 182 | - | 182 |
| Special day celebration | - | - | - | - |
| Exposure visits | 1 | 15 | - | 15 |
| Farmers Visit to KVK | 26 | 546 | 121 | 667 |
| Lecture Delivered | 52 | 1580 | 282 | 1862 |
| **Total** | **177** | **5069** | **1019** | **6088** |

Details of other extension programmes

|  |  |
| --- | --- |
| **Particulars** | **Number** |
| Electronic Media (CD./DVD) | - |
| Extension Literature | - |
| Newspaper coverage | 1 |
| Popular articles | - |
| Radio Talks | 11 |
| TV Talks | - |
| Animal health amps (Number of animals treated) | - |
| **Total** | **12** |

**3.6.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 |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Oilseeds |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Pulses |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Commercial crops |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Vegetables |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Flower crops |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Spices |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Fodder crop seeds |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Fiber crops |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Forest Species |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Others |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| **Total** |  |  |  |  |  |  |

# Production of planting materials by the KVK

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Crop** | **Name of the crop** | **Name of the variety** | **Name of the hybrid** | **Number** | **Value (Rs.)** | **Number of farmers** |
| Fruits |  |  |  |  |  |  |
|  | Mango | Keshar  Ratna  Sindhu  Others |  | 62464 |  |  |
|  | Guava | L-49 |  | 3910 |  |  |
| **Total** |  |  |  | **66374** |  |  |

**Production of Bio-Products**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Bio Products** | **Name of the bio-product** | **Quantity** | **Value (Rs.)** | **No. of Farmers** |
| **Kg** |
| Bio-pesticide | Yash tricho plain | 198 | 29700 | 135 |
|  | Yash tricho tripple | 30 | 4500 | 2 |
|  | Yash Vertim | 20 | 3000 | 1 |
|  | Yash Baeveria | 65 | 9750 | 126 |
|  | Yash Metarayzium | 50 | 7500 | 125 |
| **Total** |  | **363** | **54450** | **389** |

# Production of livestock materials

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Particulars of Live stock | **Name of the breed** | **Number** | **Value (Rs.)** | **No. of Farmers** |
| **Dairy animals** |  |  |  |  |
| Cows |  |  |  |  |
| Buffaloes |  |  |  |  |
| Calves |  |  |  |  |
| Others (Pl. specify) |  |  |  |  |
| **Goat** | Osmanabadi | 5 | 18750 | 5 |
| **Poultry** |  |  |  |  |
| Broilers |  |  |  |  |
| Layers |  |  |  |  |
| Duals (broiler and layer) |  |  |  |  |
| Japanese Quail |  |  |  |  |
| Turkey |  |  |  |  |
| Emu |  |  |  |  |
| Ducks |  |  |  |  |
| Others (Pl. specify) |  |  |  |  |
|  |  |  |  |  |
| **Piggery** |  |  |  |  |
| Piglet |  |  |  |  |
| Others (Pl.specify) |  |  |  |  |
| **Fisheries** |  |  |  |  |
| Indian carp |  |  |  |  |
| Exotic carp |  |  |  |  |
| Others (Pl. specify) |  |  |  |  |
|  |  |  |  |  |
| **Total** |  |  |  |  |

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

A. KVK News Letter ((Date of start, Periodicity, number of copies distributed etc.)

B. Literature developed/published

|  |  |  |  |
| --- | --- | --- | --- |
| **Item** | **Title** | **Authors name** | **Number** |
| Research papers | Assessment of stakeholders’ knowledge and attitude towards good agricultural  practices for grapes | Sukanya Som, R Roy Burman, J P Sharma, V Sangeetha, V Lenin, M A Iquebal and  **N J Thoke** | Indian Journal of Agricultural Sciences 87 (2): 273–7, February 2017/ |
|  | Effectiveness of Content of Self Learning Material in Agriculture | S.S. Mane, **N.J.Thoke** and A.J. Shivgaje | Trends in Biosciences 10(17), Print : ISSN 0974-8431, 3070-3074, 2017 |
| Technical reports |  |  |  |
| News letters |  |  |  |
| Technical bulletins |  |  |  |
| Popular articles |  |  |  |
| Extension literature |  |  |  |
| Others (Pl. specify) |  |  |  |
| **TOTAL** |  |  |  |

**C. Details of Electronic Media Produced**

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

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

The Broad outline for the case study may be

Title

Background

Interventions

Process

Technology

Impact

Horizontal Spread

Economic gains

Employment Generation

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

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

|  |  |  |  |
| --- | --- | --- | --- |
| **S. No.** | **Crop / Enterprise** | **ITK Practiced** | **Purpose of ITK** |
|  |  |  |  |

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

**A. Practicing Farmers**

a. Identification of courses for farmers/farm women

b.PRA survey of the village, Group discussions, Diagnostic visits, farmers visit to KVK

**B. Rural Youth**

a.Village survey to assess the needs

b.Personal interview

c.Publicity

d.Awareness among the RY for self-employment.

e.Group discussions

**C. In-service personnel**

a. Functional linkages with agriculture department and RAMETI and NGO working in agriculture field

b.Identification of courses for farmers/farm women

**5.2. Indicate the methodology for identifying OFTs/FLDs**

**For OFT:**

i) PRA

ii) Problem identified from Matrix

iii) Field level observations

iv) Farmer group discussions

v) Others if any

**For FLD:**

1. New variety/technology
2. Poor yield at farmers level
3. Existing cropping system
4. Others if any

**5.3. Field activities**

i. Name of villages identified/adopted with block name (from which year) -

ii. No. of farm families selected per village :

iii. No. of survey/PRA conducted :

iv. No. of technologies taken to the adopted villages

v. Name of the technologies found suitable by the farmers of the adopted villages:

vi. Impact (production, income, employment, area/technological– horizontal/vertical)

vii. Constraints if any in the continued application of these improved technologies

**6. LINKAGES**

1. **Functional linkage with different organizations**

|  |  |  |
| --- | --- | --- |
| **Sl.No.** | **Name of organization** | **Nature of Linkage (pl. specify)** |
| 1. 1. | Dept. of Agriculture | KVK Organized various training programmes for extension functionaries of the department in collaboration with the Department of Agriculture, ATMA programme. |
| 1. 2. | MPKV, Rahuri | Supply of seed material for FLD (O & P) |
| 1. 3. | Dr. B. S.Konkan Krishi Vidyapeeth, Dapoli | Supply of grafts, seedling of coconut, Sapota, etc. |
| 1. 4. | AIR, Nashik | Broadcasting various agricultural programmes for farmers |
| 1. 5. | NHRDF, Nashik | Supply of seed of latest variety of onion, garlic, and technical knowhow for establishing soil testing laboratory and training to farmers from outside states. |
| 1. 6. | News paper | Publicity to KVK activities, publishing the popular articles |
| 1. 7. | YCMOU, Nashik | Agricultural programmes through distance mode of education, financial help as & when required for the development of KVK. |
| 1. 8. | Dept. AH, Nashik | Data regarding Animals |
| 1. 9. | NHM | Finance for establishing Hi- tech training cun demonstration projects |
| 1. 10. | CRIDA, Hydrabad | Source for improved technology in farm implements and machineries |
|  | CIAE, Bhopal | Source for improved technology in farm implements and machineries/ Front line demonstration programmes. |
|  | IIHR, Banglore | New techniques and OFT / FLD |
|  | PD, Biocontrol Banglore | Bio-control agent |
|  | MANAGE, Hyderabad | Management training HRD |
|  | NARM, Hyderabad | Training in advance techniques for HRD, FET |
|  | CPDO, Mumbai | Authentic source for traditional poultry birds |
|  | NCL, Pune | For mother culture |
|  | Dept. Fishery | Technical information and data of fisheries |
|  | Dept. of Forest | Medicinal plant |
|  | FDCM, Nashik | Social forestry development |
|  | NIN, Hyderabad | Human Nutrition technology |

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

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

|  |  |  |  |
| --- | --- | --- | --- |
| **Name of the scheme** | **Date/ Month of initiation** | **Funding agency** | **Amount (Rs.)** |
| **RKVY-ASCI** | **March 2018** | **ICAR** | **165200** |

**C. Details of linkage with ATMA**

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

Yes

If yes, role of KVK in preparation of SREP of the district?

The SREP for the Nashik district was prepared by KVK Nashik

**Coordination activities between KVK and ATMA**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **S. No.** | **Programme** | **Particulars** | **No. of programmes attended by KVK staff** | **No. of programmes Organized by KVK** | **Other remarks (if any)** |
| **01** | **Meetings** | **All district level meets** | **10** | **1** |  |
| **02** | **Research projects** | **-** | **-** | **-** |  |
|  |  |  |  |  |  |
| **03** | **Training programmes** | **Crop wise trainings** | **6** | **3** |  |
|  |  |  |  |  |  |
| **04** | **Demonstrations** | **-** | **-** | **-** |  |
|  |  |  |  |  |  |
| **05** | **Extension Programmes** |  |  |  |  |
|  | Kisan Mela |  | **1** |  |  |
|  | Technology Week |  |  | **1** |  |
|  | Exposure visit | **-** | **-** | **-** |  |
|  | Exhibition |  | **2** | **-** |  |
|  | Soil health camps |  |  | **1** |  |
|  | Animal Health Campaigns |  |  |  |  |
|  | Others (Pl. specify) |  |  |  |  |
| **06** | **Publications** |  |  |  |  |
|  | Video Films |  |  | **1** |  |
|  | Books |  |  |  |  |
|  | Extension Literature |  |  |  |  |
|  | Pamphlets |  |  | **1** |  |
|  | Others (Pl. specify) |  |  |  |  |
| **07** | **Other Activities** (Pl.specify) |  |  |  |  |
|  | Watershed approach |  |  |  |  |
|  | Integrated Farm Development |  |  |  |  |
|  | Agri-preneurs development |  |  |  |  |

**D. Give details of programmes implemented under National Horticultural Mission**

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

**E. Nature of linkage with National Fisheries Development Board**

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

**F. Details of linkage with RKVY**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **S. No.** | **Programme** | **Nature of linkage** | **Funds received if any Rs.** | **Expenditure during the reporting period in Rs.** | **Remarks** |
| **1.** | **ASCI training programme on Agriculture Extension Service Provider** | **Funds** | **165200** | **-** | **Revalidated funds for the year 2018-19** |

**7. Convergence with other agencies and departments: TATA RALLIS, RAMETI, MAVIM, RSETI, MSME, MCED, ROTARY, ICDS, AFRO.**

**8. Innovator Farmer’s Meet**

|  |  |  |
| --- | --- | --- |
| **Sl.No.** | **Particulars** | **Details** |
|  | Have you conducted Farm Innovators meet in your district? | Yes/ No |
|  | Brief report in this regard |  |

**9. Farmers Field School (FFS)**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **S. No** | **Thematic area** | **Title of the FFS** | **Budget proposed in Rs.** | **Brief report** |
|  |  |  |  |  |
|  |  |  |  |  |

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

|  |  |
| --- | --- |
| **S. No** | **Feed Back** |
| 1. Little Millet | The variety Phule Ekadashi variety gives more yield than local variety |
| 2. Paddy | Use of urea-DAP briquettes was useful for enhancing growth and yield |
| 3. Finger Millet | Phule Nachani variety was non-lodging character and gives more yield |
| 4. Soybean | This variety gives better yield in rainfall situation at pod development stage |
| 5. Niger | Topping technology enhances the more number of flowers which leads higher yield |
| 6. Chickpea | The ICM technology gives better yield |
| 7. Finger Millet (STCR) | Soil test based fertilizer application increased yield |
| 8.Paddy (STCR) | Soil test based fertilizer application increased yield |
| 9.Garlic | Garlic variety Phule nileema is attractive colour with bold bulb size. Good market rate. Higher yield over to local variety. |
| 10.Onion | Onion variety agrifound light given 10-15 percent higher yield than local variety. Avarage bulb size is good. Less percentage of joint onions. |
| 11.Potato | Potato Variety Kufri Joyti Have good average bulb size, Good Attractive texture on skin. |

**10.2. Technical Feedback from the KVK Scientists (Subject wise) to the research institutions/universities:**

**11. Technology Week celebration during 2017-18 Yes/No, If Yes**

Period of observing Technology Week: From 05.12.2017 to 09.12.2018

Total number of farmers visited : 1238

Total number of agencies involved : 04

Number of demonstrations visited by the farmers within KVK campus: 08

Other Details

| **Types of Activities** | **No. of**  **Activities** | **Number of**  **Farmers** | **Related crop/livestock technology** |
| --- | --- | --- | --- |
| Gosthies |  |  |  |
| Lectures organized | 07 | 1238 | Post Harvest Technology, Export Oriented Grape Production, Organic Farming, Mechanization in Agriculture, Soil and water testing, Small scale agro-processing for women, Poultry farming |
| Exhibition | - | - | - |
| Film show | 04 | 1238 | Post Harvest Processing of fruits and vegetables, Poultry farming, Mechanization in Agriculture, Nursery management |
| Fair |  |  |  |
| Farm Visit | 05 | 1238 | Nursery unit, Poultry unit, Goat unit, Vermicompost unit, Micro-irrigation unit, High density fruit farm, Plant library unit |
| Diagnostic Practicals | 02 | 1238 | Vermicomposting, Nursery management |
| Supply of Literature (No.) | 14 | 1238 | Soybean, Bengal gram, Wheat, Niger, Fingermillet, Groundnut, Mango, Guava, Drumstick production technology. Also, Mushroom production, Niger processing, Small scale mechanization, Soil and water testing |
| Supply of Seed (q) | - | - | - |
| Supply of Planting materials (No.) | - | - | - |
| Bio Product supply (Kg) | - | - | - |
| Bio Fertilizers (q) | - | - | - |
| Supply of fingerlings | - | - | - |
| Supply of Livestock specimen (No.) | 1 | 5 | Supply of improved Osmanabadi breeds |
| Total number of farmers visited the technology week | 01 | 1238 |  |

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

A. Introduction of alternate crops/varieties

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

B. Major area coverage under alternate crops/varieties

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

C. Farmers-scientists interaction on livestock management

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

D. Animal health camps organized

|  |  |  |  |
| --- | --- | --- | --- |
| **State** | **Number of camps** | **No.of animals** | **No.of farmers** |
|  |  |  |  |
|  |  |  |  |
| **Total** |  |  |  |

E. Seed distribution in drought hit states

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

F. Large scale adoption of resource conservation technologies

|  |  |  |  |
| --- | --- | --- | --- |
| **State** | **Crops/cultivars and gist of resource conservation technologies introduced** | **Area (ha)** | **Number of farmers** |
|  |  |  |  |
|  |  |  |  |
| **Total** |  |  |  |

G. Awareness campaign

|  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **State** | **Meetings** | | **Gosthies** | | **Field days** | | **Farmers fair** | | **Exhibition** | | **Film show** | |
|  | **No.** | **No.of farmers** | **No.** | **No.of farmers** | **No.** | **No.of farmers** | **No.** | **No.of farmers** | **No.** | **No.of farmers** | **No.** | **No.of farmers** |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  | | | |  | | | |
| **Total** |  |  |  |  |  | | | |  | | | |

**13. IMPACT**

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

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Name of specific technology/skill transferred** | **No. of participants** | **% of adoption** | **Change in income (Rs.)** | |
| **Before (Rs./Unit)** | **After (Rs./Unit)** |
| Onion-Improved Variety: NHRDF RED-3 | 22 | 54.54 | **74250** | **85500** |
| Grafting in Grapes rootstock | 20 | 35 | **17500** | **28900** |
| STCR in FingerMillet | 20 |  | **5632** | **10854** |
| STCR in Paddy | 30 |  | **32400** | **52633** |
| Soybean Var. MACS-1188 | 100 | 61 | **69173** | **42323** |

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

**B. Cases of large scale adoption**

**(Please furnish detailed information for each case)**

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

**14. Kisan Mobile Advisory Services**

|  |  |  |  |
| --- | --- | --- | --- |
| **Month** | **No. of SMS sent** | **No. of farmers to which SMS was sent** | **No. of feedback / query on SMS sent** |
| **April 2017** | 1 | 351 |  |
| **May** | 1 | 1430 |  |
| **June** | 4 | **1581** |  |
| **July** | 4 | 1581 |  |
| **August** | 20 | 8566 |  |
| **September** | 11 | 8477 |  |
| **October** | 5 | 3972 |  |
| **November** | 1 | 102 |  |
| **December** | 1 | 103 |  |
| **January 2018** | 0 | 0 |  |
| **February** | 3 | 3292 |  |
| **March** | 1 | 349 |  |

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Name of KVK** | **Message Type** | **Type of Messages** | | | | | | |
| **Crop** | **Livestock** | **Weather** | **Marke-ting** | **Aware-ness** | **Other enterprise** | **Total** |
|  | Text only | 40 | 4 | 1 | 0 | 0 | 7 | 52 |
| Voice only | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Voice & Text both | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
|  | **Total Messages** | **40** | **4** | **1** | **0** | **0** | **7** | **52** |
|  | **Total farmers Benefitted** | **16903** | **3296** | **1337** | **0** | **0** | **8268** | **29804** |

**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 | Nursery | 1998 | **1** | Mango  Keshar  Ratna  Sindhu  Others | Grafts | 6083 |  | 304150 |  |
|  |  |  |  | Guava | Grafts | 2643 |  | 132150 |  |
|  |  |  |  | Coconut | Seedlings | 753 |  | 60175 |  |
|  |  |  |  | Jackfruit | Plants | 353 |  | 8825 |  |
|  |  |  |  | Ornamentals | Plants | 443 |  | 8860 |  |
|  |  |  |  | Avocado | Plants | 27 |  | 5400 |  |
| 2 | High Tech Floriculture | May 17 | **15R** | Gerbera | Flowers | 710 |  | 2130 |  |

**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.) | | Remarks |
| Variety | Type of Produce | Qty. | Cost of inputs | Gross income |
| Cereals | |  |  |  |  |  |  |  |  |  |
|  | |  |  |  |  |  |  |  |  |  |
| Pulses | |  |  |  |  |  |  |  |  |  |
|  | |  |  |  |  |  |  |  |  |  |
| Oilseeds | |  |  |  |  |  |  |  |  |  |
|  | |  |  |  |  |  |  |  |  |  |
| Fibers | |  |  |  |  |  |  |  |  |  |
|  | |  |  |  |  |  |  |  |  |  |
| Spices & Plantation crops | | | | | | | | | | |
|  |  | |  |  |  |  |  |  |  |  |
| Floriculture |  | |  |  |  |  |  |  |  |  |
|  |  | |  |  |  |  |  |  |  |  |
| Fruits |  | |  |  |  |  |  |  |  |  |
| Grapes | 2012 | | 2018 | 0.8 | Thompson | Fruits | 9388Kg |  | 147186 |  |
| Sapota | 26-06-1996 | | Round the year | 0.8 | Kallipatti | Fruits | 5Ton |  | 70010 |  |
| Guava | 30-06-1996 | | Round the year | 0.8 | Sardar | Fruits | 10Ton |  | 162200 |  |
| Aonla | 11-08-1995 | | June | 0.4 |  | Fruits | 1275 |  | 25500 |  |
| Avocado | 09-07-2000 | |  |  | Local Selection | Fruits | 145 |  | 14500 |  |
| Jackfruit | 05-07-2001 | |  |  | Kappa  Barka | Fruits | 3589 |  | 35885 |  |
| Coconut |  | |  |  |  | Fruits | 972 |  | 14470 |  |
| Custard Apple |  | |  |  |  | Fruits | 100 |  | 1000 |  |
| Vegetables |  | |  |  |  |  |  |  |  |  |
|  |  | |  |  |  |  |  |  |  |  |
| Others (specify) | | | | | | | | | | |
|  | |  |  |  |  |  |  |  |  |  |
|  | |  |  |  |  |  |  |  |  |  |

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

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Sl.  No. | Name of the Product | Qty | Amount (Rs.) | | Remarks |
| Cost of inputs | Gross income |
| 1 | Yash tricho plain | 198 | 13860 | 29700 | CIB Registration under process |
| 2 | Yash tricho tripple | 30 | 2100 | 4500 |  |
| 3 | Yash Vertim | 20 | 1400 | 3000 |  |
| 4 | Yash Baeveria | 65 | 4550 | 9750 |  |
| 5 | Yash Metarayzium | 50 | 3500 | 7500 |  |

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

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

**E. Utilization of hostel facilities**

Accommodation available (No. of beds):

|  |  |  |  |
| --- | --- | --- | --- |
| **Months** | **No. of trainees stayed** | **Trainee days (days stayed)** | **Reason for short fall (if any)** |
| April 2017 |  |  |  |
| May 2017 |  |  |  |
| June 2017 |  |  |  |
| July 2017 | 42 | 05 |  |
| August 2017 | 28 | 05 |  |
| September 2017 |  |  |  |
| October 2017 | 24 | 05 |  |
| November 2017 | 20 | 15 |  |
| December 2017 |  |  |  |
| January 2018 | 31 | 05 |  |
| February 2018 | 48 | 05 |  |
| March 2018 | 18 | 30 |  |

**F. Database management**

|  |  |  |
| --- | --- | --- |
| **S. No** | **Database target** | **Database created** |
| **1** | Creation of KVK activities Database | Extension programmes data collection in excel |

**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 Demonstration s** | **No. of plant materials produced** | **Visit by farmers**  **(No.)** | **Visit by officials**  **(No.)** |  |  |
|  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |

**16.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 | Central Bank Of India | Yashwantrao Chavan Mah. O.U. Branch, Nashik – 422 222 | 284246 | Finance Officer Y.C.M.OPEN UNIVERSITY NASHIK | 1323004456 | 422016503 | CBIN0284246 |
| With KVK |  |  |  |  |  |  |  |

**B. Utilization of KVK funds during the year 2017-18 (Rs. in lakh)**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **S.**  **No.** | **Particulars** | **Sanctioned** | **Released** | **Expenditure** |
| **A. Recurring Contingencies** | | | | |
| 1 | **Pay & Allowances** | 15100000 | 15100000 | 11522175 |
| 2 | **Traveling allowances** | 200000 | 200000 | 141283 |
| 3 | **Contingencies** | 0 | 0 | 0 |
| *A* | Stationery, telephone, postage and other expenditure on office running, publication of Newsletter and library maintenance (Purchase of News Paper & Magazines) | 458000 | 458000 | 1920121 |
| *B* | POL, repair of vehicles, tractor and equipments |
| *C* | Meals/refreshment for trainees (ceiling upto Rs.40/day/trainee be maintained) |
| *D* | Training material (posters, charts, demonstration material including chemicals etc. required for conducting the training) |
| *E* | Frontline demonstration except oilseeds and pulses (minimum of 30 demonstration in a year) |
| *F* | On farm testing (on need based, location specific and newly generated information in the major production systems of the area) |
| *G* | Training of extension functionaries |
| *H* | Maintenance of buildings |
| *I* | Establishment of Soil, Plant & Water Testing Laboratory |
| *J* | Library |
| **TOTAL (A)** | | **15758000** | **15758000** | **13583579** |
| **B. Non-Recurring Contingencies** | | 0 | 0 | 0 |
| 1 | **Works** | 0 | 0 | 0 |
| 2 | **Equipments including SWTL & Furniture** | 0 | 0 | 0 |
| 3 | **Vehicle** (Four wheeler/Two wheeler, please specify) | 0 | 0 | 0 |
| 4 | **Library** (Purchase of assets like books & journals) | 0 | 0 | 0 |
| **TOTAL (B)** | | **0** | **0** | **0** |
| **C. REVOLVING FUND** | | 0 | 0 | 0 |
| **GRAND TOTAL (A+B+C)** | | **15758000** | **15758000** | **13583579** |

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

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Year** | **Opening balance as on 1st April** | **Income during the year** | **Expenditure during the year** | **Net balance in hand as on 1st April of each year** |
| April 2015 to March 2016 | 1097960 | 4871760 | 5242180 | 727540 |
| April 2016 to March 2017 | 727540 | 4078567 | 3375892 | 1430215 |
| April 2017 to March 2018 | 1430215 | 1222530 | 2370309 | 282436 |

**17. Details of HRD activities attended by KVK staff during year**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Name of the staff | Designation | Title of the training programme | Institute where attended | Dates |
| Dr. Niteen Jaysing Thoke | Subject Matter Specialist (Agril. Extension) | Advances in Instructional Technologies in Enhancing Teaching- Learning and Training Competencies | Indian Agricultural Research Institute (IARI), New Delhi | 13.10.2017 to 02.11.2017 |
| Mrs. Archana Deshmukh | Subject Matter Specialist (Home Science) | Promotion of Agro enterprises and food processing | Ni-MSME, Hyderabad | 21-23 February, 2017 |
| Mrs. Archana Deshmukh | Subject Matter Specialist (Home Science) | Food processing and nutritional linkage for entrepreneurship development | PAU, Ludhiana | 25 October to 14 November, 2017 |
| Mrs. Archana Deshmukh | Subject Matter Specialist (Home Science) | Capacity building of Home Science experts in KVK, Maharashtra | KVK, Jalna | 27-29 November, 2017 |
| Harshal Kale | Programme Assistant (Computer) | Use of Social Media for Transfer of Technology | EEI, Anand | 5-9 February, 2018 |
| Mangesh Vyavahare | Programme Assistant (Lab) | Soil testing and fertilizer use | MPKV, Rahuri | 15-17 February, 2018 |

**18. Please include any other important and relevant information which has not been reflected above (write in detail).**

**APR SUMMARY**

1. **Training Programmes**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Clientele** | **No. of Courses** | **Male** | **Female** | **Total participants** |
| Farmers & farm women | **85** | **1756** | **597** | **2353** |
| Rural youths | **9** | **207** | **47** | **254** |
| Extension functionaries | **30** | **795** | **233** | **1028** |
| Sponsored Training | **30** | **795** | **233** | **1028** |
| Vocational Training | **9** | **207** | **47** | **254** |
| **Total** | 124 | 2758 | 877 | 3635 |

1. **Frontline demonstrations**

|  |  |  |  |
| --- | --- | --- | --- |
| **Enterprise** | **No. of Farmers** | **Area(ha)** | **Units/Animals** |
| Oilseeds | 135 | 55 |  |
| Pulses | 125 | 50 |  |
| Cereals | 184 | 53.5 |  |
| Vegetables | 38 | 05 |  |
| Other crops |  |  |  |
| Hybrid crops |  |  |  |
| **Total** |  |  |  |
| Livestock & Fisheries | 53 |  | 1602 |
| Other enterprises | 82 | 10 |  |
| **Total** |  |  |  |
| **Grand Total** | **617** | **173.5** | **1602** |

1. **Technology Assessment & Refinement**

|  |  |  |  |
| --- | --- | --- | --- |
| **Category** | **No. of Technology Assessed & Refined** | **No. of Trials** | **No. of Farmers** |
| **Technology Assessed** |  |  |  |
| Crops | 6 | 66 | 66 |
| Livestock | 2 | 20 | 20 |
| Various enterprises | 1 | 20 | 20 |
| **Total** | 9 | 106 | 106 |
| **Technology Refined** |  |  |  |
| Crops | - | - | - |
| Livestock | - | - | - |
| Various enterprises | - | - | - |
| **Total** | - | - | - |
| **Grand Total** | **9** | **106** | **106** |

1. **Extension Programmes**

|  |  |  |
| --- | --- | --- |
| **Category** | **No. of Programmes** | **Total Participants** |
| Extension activities | 177 | 6088 |
| Other extension activities | 12 | NA |
| **Total** | 189 |  |

1. **Mobile Advisory Services**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Name of KVK** | **Message Type** | **Type of Messages** | | | | | | |
| **Crop** | **Livestock** | **Weather** | **Marke-ting** | **Aware-ness** | **Other enterprise** | **Total** |
|  | Text only | 40 | 4 | 1 | 0 | 0 | 7 | 52 |
| Voice only | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Voice & Text both | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
|  | **Total Messages** | **40** | **4** | **1** | **0** | **0** | **7** | **52** |
|  | **Total farmers Benefitted** | **16903** | **3296** | **1337** | **0** | **0** | **8268** | **29804** |

1. **Seed & Planting Material Production**

|  |  |  |
| --- | --- | --- |
|  | **Quintal/Number** | **Value Rs.** |
| Seed (q) | - | - |
| Planting material (No.) | 66374 | 3318700 |
| Bio-Products (kg) | 363 | used for demo & farm |
| Livestock Production (No.) | 5 | 18750 |
| Fishery production (No.) |  |  |

1. **Soil, water & plant Analysis**

|  |  |  |
| --- | --- | --- |
| **Samples** | **No. of Beneficiaries** | **Value Rs.** |
| Soil | 823 | 313800 |
| Water | 12 | 1800 |
| Plant | - | - |
| **Total** | **835** | **315600** |

1. **HRD and Publications**

|  |  |  |
| --- | --- | --- |
| **Sr. No.** | **Category** | **Number** |
| 1 | Workshops | 4 |
| 2 | Conferences | 1 |
| 3 | Meetings | 24 |
| 4 | Trainings for KVK officials | 6 |
| 5 | Visits of KVK officials | 2 |
| 6 | Book published | - |
| 7 | Training Manual | 1 |
| 8 | Book chapters | - |
| 9 | Research papers | 2 |
| 10 | Lead papers | - |
| 11 | Seminar papers | - |
| 12 | Extension folder | - |
| 13 | Proceedings | - |
| 14 | Award & recognition | 2 |
| 15 | On going research projects | - |