

## Chapter 1

### About Zonal Project Directorate

The Agricultural Extension Division, one of the eight divisions of Indian Council of Agricultural Research (ICAR), New Delhi has established a network of KrishiVigyanKendras (KVKs) all over the country under the umbrella of ICAR institutes, State Agricultural Universities (SAUs), State Department of Agriculture and Non-Government Organizations (NGOs) with an aim to assess, refine and demonstrate technologies in agriculture and allied sectors. Agriculture Extension Division headed by the Deputy Director General (Agricultural Extension) monitors and reviews the progress of KVKs through its eight Zonal Project Directorates located at different parts of the country. (Table-1)

**Table 1: Zonal Project Directorates and States/Union Territories (UTs)**

<b>Zones</b>	<b>No. of States and UTs</b>	<b>States/UTs</b>
I	5	Delhi, Haryana, Himachal Pradesh, Jammu & Kashmir and Punjab
II	4	A & N Islands, Bihar, Jharkhand and West Bengal
III	8	Assam, Arunachal Pradesh, Manipur, Meghalaya, Mizoram, Nagaland, Sikkim and Tripura
IV	2	Uttar Pradesh and Uttarakhand
V	2	Andhra Pradesh and Maharashtra
VI	4	Rajasthan, Gujarat, Diu and Daman
VII	3	Chhattisgarh, Madhya Pradesh and Odisha
VIII	6	Karnataka, Tamil Nadu, Kerala, Goa, Puducherry and Lakshadweep

#### 1.1 Genesis

The ICAR established 8 Zonal Coordinating Units (ZC Units) in September 1979 to monitor and coordinate its Lab to Land Programme (LLP), which was launched in 1979 on occasion of ICAR's Golden Jubilee celebrations. To begin with, ZC Unit-Zone-I had its office at Punjab Agricultural University (PAU) Ludhiana in 1979. The jurisdiction of Zone-1 included Punjab, Haryana, New Delhi, Himachal Pradesh and Jammu & Kashmir. The Unit was converted as a Plan Scheme in 1986 with additional staff and objective of monitoring other transfer of technology projects of ICAR viz. KVKs, Trainers Training Centres (TTC), National Demonstration Scheme (NDS), Operational Research Project (ORP), Scheduled Caste & Schedule Tribe Project and Special Project on Oilseeds. During 1990-91, another objective of implementing and monitoring of National Pulse Project was started.

The ZC Units were upgraded as Zonal Project Directorates (ZPDs) during the XI Five Year Plan (2009) with the same staffing pattern and infrastructure. The Zonal Coordinators were re-designated as Zonal Project Directors with financial and administrative powers akin to Directors of other ICAR institutes.

## 1.2 Mandate

### Mandate of the Zonal Project Directorate is as follows:

- Formulate, implement, monitor and evaluate the programmes and activities of KVKs and Agricultural Technology Information Centres (ATICs).
- Coordinate the work relating to KVKs and ATICs implemented through various agencies such as SAUs, ICAR institutes, NGOs and developmental departments.
- Coordinate with State/Central Government organizations, credit institutions and any other organization for successful implementation of programmes.
- Serve as feedback mechanism to research and extension systems.
- Help in implementation of other projects on oilseeds, pulses, maize, cotton, improved implements, climate resilient etc. assigned by ICAR headquarters.
- Have a very close liaison with ICAR headquarters particularly with Deputy Director General (Agricultural Extension) for preparing reports/ write-ups for ICAR.

## 1.3 Staff

Total sanctioned staff strength of Zonal Project Directorate-Zone-I, Ludhiana 18, out of which 11 are filled (Table 2).

**Table 2: Staff strength of Zonal Project Directorate- Zone-I**

Category	Sanctioned	Filled
Zonal Project Director (RMP)	1	1
Principal Scientist	1	0
Senior Scientists	3	3
Scientists	2	0
Technical	1	1
Administrative	8	6
SS (Gr-II)	2	0
<b>Total</b>	<b>18</b>	<b>11</b>

## 1.4 Organizational Structure

The organizational structure of Zonal Project Directorate-Zone I and KVKs functioning in the jurisdiction of this Directorate is depicted in Fig. I.

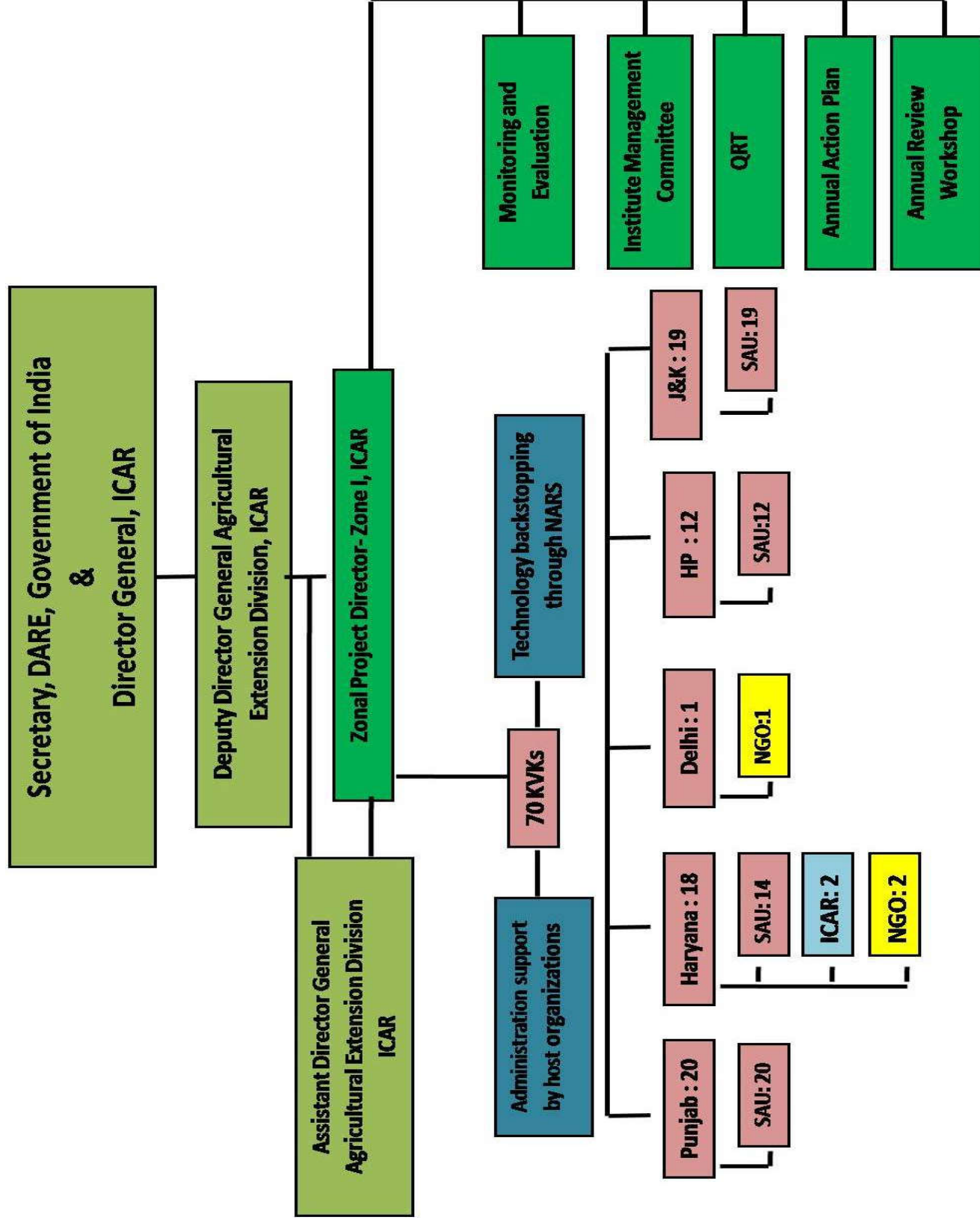


Fig.1 Organizational Structure of Zonal Project Directorate- Zone-I

### 1.5 Inauguration of the Administrative Building of the Directorate

The Secretary, Department of Agricultural Research and Education (DARE) and Director General (DG), Indian Council of Agricultural Research (ICAR), Dr. S. Ayyappan inaugurated administrative building of Zonal Project Directorate, Zone-I, Ludhiana constructed at a cost of Rs.3.38 crore on 05.01.2014. Dr. K.D.Kokate, Deputy Director General (Agril. Extension) and Dr. K.M.L.Pathak, Deputy Director General (Animal Sciences), ICAR, New Delhi joined the Secretary (DARE) & DG (ICAR) in inauguration of the building. About 150 persons including scientists and officers from ICAR, New Delhi; Deans, Directors, Zonal Project Directors and senior officers of PAU and GADVASU; and Programme Coordinators as well as Subject Matter Specialists of KVKs of Zone-I witnessed the ceremony. In his address, Dr.Ayyappan congratulated the Zonal Project Director, Zone-I, for construction of state of art building in short span of time and thanked the Vice Chancellor of PAU, Dr. B.S.Dhillon for providing land and other supports to the Zonal Project Directorate (ZPD), Zone-I. He expressed his happiness over the good collaboration and coordination of ZPD with state agricultural universities in the zone and said that KrishiVigyanKendras (KVKs) had contributed a lot in increased agricultural production in the country.

Dr. Kokate said that construction of this building would further boost the performance of KVKs of Zone-I. He told that infrastructure development like this was necessary for the growth of any organization and advised other Zonal Project Directors to work in the same mode.





### 1.6 Budget

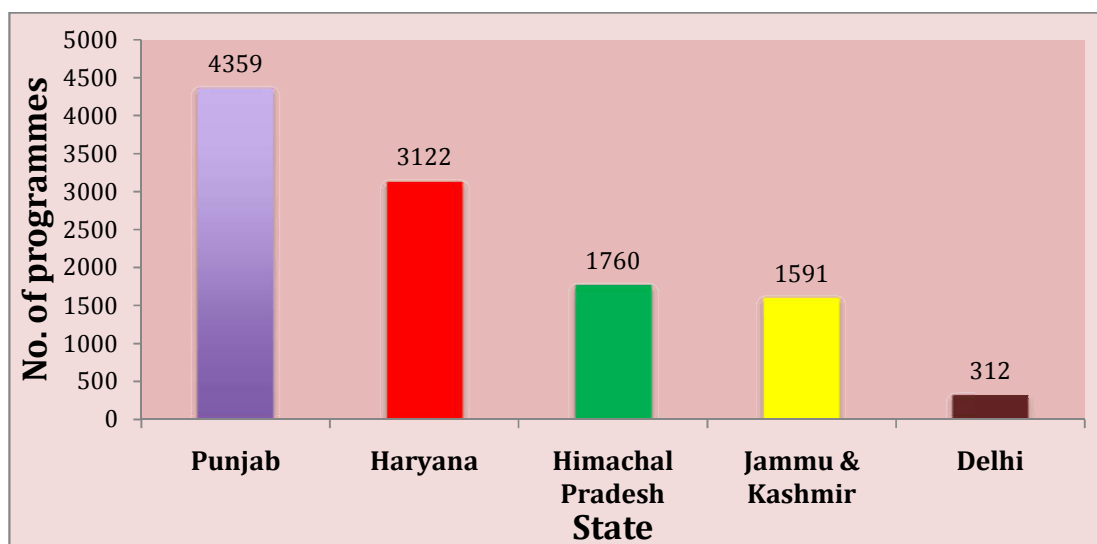
A total of Rs. 5781.63 lakh was sanctioned to Zone-I for the year 2013-14 and 100per cent of the sanctioned budget was incurred as expenditure. Head wise details of sanctioned budget and expenditure are given as under :-

#### Head wise budget and expenditure of Zone-I for 2013-14(Rs. in lakh)

Head	Sanction				Expenditure			
	ZPD	KVKs	Support to DEE at SAUs	Total	ZPD	KVKs	Support to DEE at SAUs	Total
<b>(A) Recurring</b>								
Pay & Allownce	91.30	4792.70	0.00	<b>4884.00</b>	91.30	4792.70	0.00	<b>4884.00</b>
TA	5.00	65.54	2.85	<b>73.39</b>	5.00	65.54	2.85	<b>73.39</b>
HRD	0.50	0.00	2.75	<b>3.25</b>	0.50	0.00	2.75	<b>3.25</b>
Contingencies	25.00	560.61	9.63	<b>595.24</b>	25.00	560.61	9.63	<b>595.24</b>
<b>Total</b>	<b>121.80</b>	<b>5418.85</b>	<b>15.23</b>	<b>5555.88</b>	<b>121.80</b>	<b>5418.85</b>	<b>15.23</b>	<b>5555.88</b>
<b>(B) Non Recurring</b>								
Equipment	5.00	0.00	0.00	<b>5.00</b>	5.00	0.00	0.00	<b>5.00</b>
Works	112.97	76.78	0.00	<b>189.75</b>	112.97	76.78	0.00	<b>189.75</b>
Vehicle	0.00	24.00	0.00	<b>24.00</b>	0.00	24.00	0.00	<b>24.00</b>
Revolving Fund	0.00	7.00	0.00	<b>7.00</b>	0.00	7.00	0.00	<b>7.00</b>
<b>Total</b>	<b>117.97</b>	<b>107.78</b>	<b>0.00</b>	<b>225.75</b>	<b>117.97</b>	<b>107.78</b>	<b>0.00</b>	<b>225.75</b>
<b>Grand Total (A+B)</b>	<b>239.77</b>	<b>5526.63</b>	<b>15.23</b>	<b>5781.63</b>	<b>239.77</b>	<b>5526.63</b>	<b>15.23</b>	<b>5781.63</b>

### 3.1.4 Frontline Extension Programmes

KVKs made efforts to create awareness about recent developments in agriculture and allied sectors among farmers, extension personnel and other stakeholders through different individual, group and mass contact methods. Further, KVKs are in the forefront of mass media utilization in disseminating timely and relevant technologies to the farming community without any time lag. Frontline extension programmes undertaken by the KVKs helps to disseminate various agriculture related technologies among farmers on a large scale. In this process the coordination with development departments and private agencies is crucial for successful executing of extension programmes. Various extension programmes carried out by KVKs in coordination and collaboration with other line departments/agencies working in the district during the year 2013-14 are briefly presented here under.



**Fig.1. State wise details of frontline extension programmes organized**

A total of 11144 extension programmes were organized through different methods and means wherein technologies related to agriculture and allied sectors were appraised among 4.39 lakh farmers and 0.15 lakh extension personnel on various aspects like varietal performance, production technologies, Integrated Pest and Disease Management, animal health and nutrition, production technologies of poultry, fisheries, human nutrition etc. **(Table-)**. Data further indicated that KVKs in Punjab organized maximum extension programmes (4359) followed by Haryana (3122), Himachal Pradesh (1760), Jammu & Kashmir (1591) and Delhi (312). Fig.1 indicates the extension programmes organized by different states during 2013-14.

The activity wise details of extension programmes organized are furnished in **Table 1**. Data implies that KVKs' efforts through extension programmes covered a large number of farmers and created awareness about new technologies, activities and agri-enterprises.

**Table1: Activity wise extension programmes organized and distribution of participants**

Activity	No. of programmes	No. of farmers			No. of extension personnel		
		Men	Women	Total	Men	Women	Total
Animal Health Camps	73	5119	1456	6575	96	0	96
Awareness Campaigns	109	7342	873	8215	1844	61	1905
Celebration of important Days	118	4482	3327	7809	222	152	374
Diagnostic Visits	1698	7200	1795	8995	137	73	210
Ex-trainee Sammelan	50	2239	1054	3293	68	27	95
Exhibition	310	61444	8865	70309	931	218	1149
Exposure Visits	379	8705	3344	12049	152	61	213
Extension Literature	253	13149	3905	17054	78	22	100
Farmer's Seminar	60	4750	455	5205	203	29	232
Farmers Science Clubs	50	709	255	964	17	10	27
Fields Days	391	14299	2367	16666	852	90	942
Film Shows	485	9056	3230	12286	217	49	266
Group Meetings	760	11175	1865	13040	545	80	625
KisanGhasthi	300	25698	6657	32355	2983	307	3290
KisanMela	80	52759	8188	60947	474	231	705
Lectures Delivered	3685	105508	20970	126478	2522	821	3343
MahilaMandals Meetings	35	0	179	179	0	2	2
Meetings of SHGs	107	168	1636	1804	12	51	63
Method Demonstrations	1894	20816	6081	26897	1197	430	1627
Seed Treatment Campaigns	11	441	83	524	1	0	1
Soil Health Campaigns	67	1618	355	1973	27	4	31
Soil Testing Campaigns	83	2180	338	2518	63	1	64
Workshops	146	2979	722	3701	346	47	393
<b>Total</b>	<b>11144</b>	<b>361836</b>	<b>78000</b>	<b>439836</b>	<b>12987</b>	<b>2766</b>	<b>15753</b>

The different participants participated in the various extension activities organized by different KVKs are presented in table No. 2.

**Table2: State wise frontline extension programmes organized and distribution of participants**

Activity	No. of programmes	No. of farmers			No. of extension personnel			Grand Total
		Men	Women	Total	Men	Women	Total	
Punjab	4359	176305	30701	207006	1795	1171	2966	209972
Haryana	3122	101908	17623	119531	6643	979	7622	127153
Delhi	312	3900	2722	6622	29	6	35	6657
Himachal Pradesh	1760	32863	18462	51325	825	318	1143	52468
Jammu & Kashmir	1591	46860	8492	55352	3695	292	3987	59339
<b>Total</b>	<b>11144</b>	<b>361836</b>	<b>78000</b>	<b>439836</b>	<b>12987</b>	<b>2766</b>	<b>15753</b>	<b>455589</b>

In respect of utilizing mass media KVKs popularized technologies through extension literature (253), newspaper coverage (2394), popular articles (417)TV talks (445) and radio talks (300). State-wise details of extension programmes are presented in Table3.

**Table 3: State-wise extension programmes organized for mass contact**

Activity	No. of programmes					Total
	Punjab	Haryana	Delhi	Himachal Pradesh	Jammu & Kashmir	

Extension Literature	48	102	20	22	61	253
Newspaper coverage	480	1406	21	334	153	2394
Popular articles	110	158	4	72	73	417
Radio Talks	118	63	26	20	73	300
TV talks	144	27	36	26	212	445

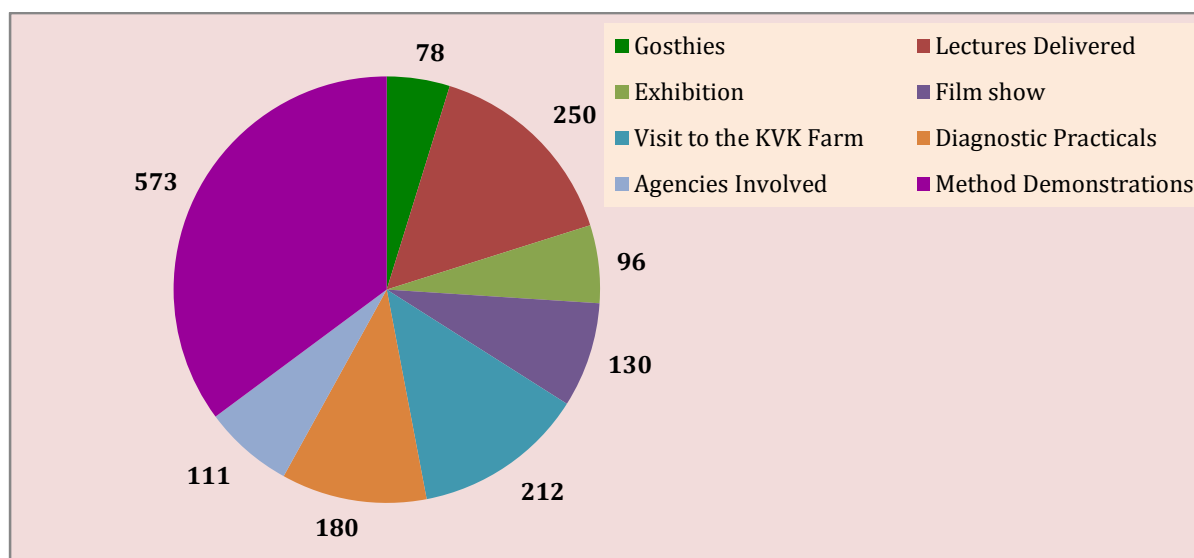
KVKs has organized a total of 11144 number of extension programmes and created awareness among 4.39 lakh farmers and 0.15 lakh extension personnel and public on various aspects like varietal performance, production technologies, resource conservation technologies, protected cultivation, diversification through horticulture and floriculture, net house technologies, Integrated Pest and Disease Management, animal health and nutrition, production of animal, poultry, crop, human nutrition etc.



### 3.1.5 Technology week

Technology week is being organized by KVKs to demonstrate and create awareness among the stakeholders about the latest technologies on various aspects of agriculture and allied sectors generated by NARS. Normally it is observed for a period of 4 to 6 days. A total of 21993 farmers have participated in technology week programmes organized by 32 KVKs. This programme enabled the KVKs to have strong linkages and collaboration with various line departments of the district, as evident by the involvement of 108 agencies, technical programmes including 78 kisanghosties, 250 lectures from eminent scientists and experienced officials, 96 exhibitions, 130 film shows, 212 visits to the KVK farm and 573 method demonstrations on hands on experience.

In addition, 1176.90 qof high yielding varieties/hybrid seeds and 84882 planting materials were made available to participating farmers, farm women, extension officials and other stakeholders.



**Fig.1: Number of different activities conducted during the celebration of technology week by KVKs.**

### 3.1.6 Kisan Mobile Advisory

Kisan Mobile Advisory is one of the Information and Communication Technology (ICT) tools for dissemination of requisite and need based agricultural information to the farmers at the right time. KVKs are sending information via short message service to farmers advising them on the vital issues of agricultural importance. During the reporting period, 41 KVKsof Zone have advised farmers regularly on the areas of crops, livestock, weather, marketing and any other information related toawareness of latest agricultural technologies generated by State Agricultural Universities through the text messages depending on the expertise and facility available with KVKs. A total of 1325 text messagesregarding agriculture and allied fields weredelivered to 27639 farmers of the Zone. The messages were mainly based on crops (680), awareness among the farmers about agricultural based

technologies (322), livestock (128), any other agro based enterprises & allied fields(78), weather(37) and marketing (22).

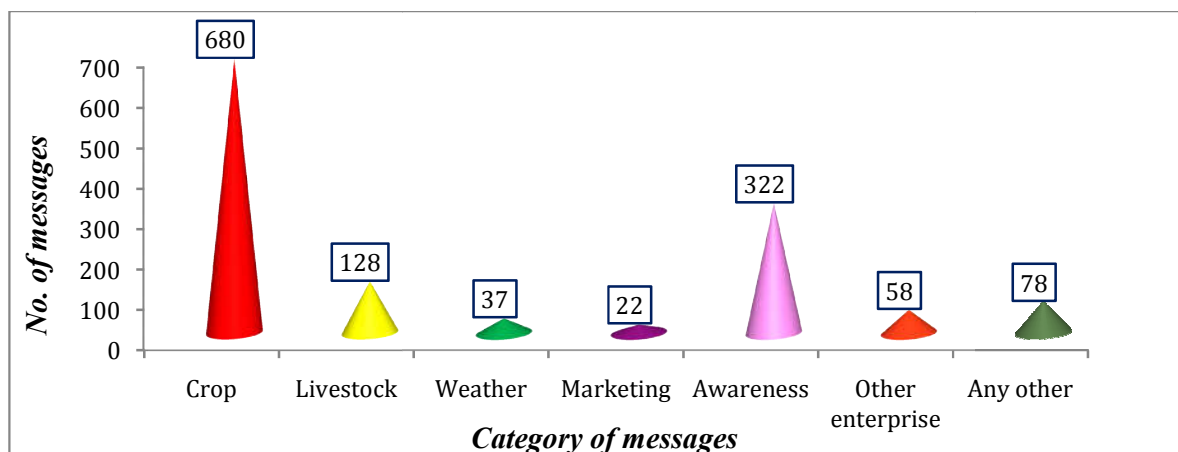


Fig.No. Number of text messages sent to farmers on various field in agriculture

Table.No.

SI. No.	Name of the State	No. of Farmers	No. of Messages (Text)	Crop	Livestock	Weather	Marketing	Awareness	Any other
1.	Punjab	13952	393	244	25	5	0	82	37
2.	Haryana	9000	279	107	23	4	14	109	22
3.	Delhi	1000	18	11	5	0	0	0	2
4.	Himachal Pradesh	3067	107	68	13	0	1	11	14
5.	Jammu&Kashmir	620	528	250	62	28	7	120	61
	<b>Total</b>	<b>27639</b>	<b>1325</b>	<b>680</b>	<b>128</b>	<b>37</b>	<b>22</b>	<b>322</b>	<b>136</b>

### 3.1.8 Production of technological inputs

To achieve the potential yield in agriculture and allied sectors, timely availability of good quality seeds, planting materials, livestock breeds and bio-products are the primary requirement. In this direction, KVKs are actively involved in the production of quality seeds, planting materials, livestock material and bio-products and supply them to needy farmers.

During the period under report, KVKs have produced **12163.83** seed of crop varieties and **34.82 q** bio-fertilizers and supplied to 51734 and 982 farmers. Further KVKs produced 3438 number of bio-agents and supplied to Department of Agriculture in Himachal Pradesh for further demonstrations to farmers. KVKs produced 9.21 lakh number of planting materials and 0.94 lakh number of livestock and fisheries worth Rs.14.19 lakh and 6.36 lakh and supplied to 12053 and 391 farmers (Table- )

**Table: Production and supply of technological inputs**

Sl.No.	Category	Quantity	Value(Rs.in lakh)	Farmers (No.)
1	Seeds of crop varieties(q)	12163.83	306.24	51734
2.	Bio-fertilizer (q)	34.82	1.72	982
3.	Bio-Agents(No.)	3438	3.44	--
4.	Planting Material (no. in lakh)	9.21	14.19	12053
5.	Livestock and fisheries (no. in lakh)	0.94	6.36	391
	<b>Total</b>		<b>331.95</b>	<b>65160</b>

**Table: State-wise production of seeds and planting materials by KVKs**

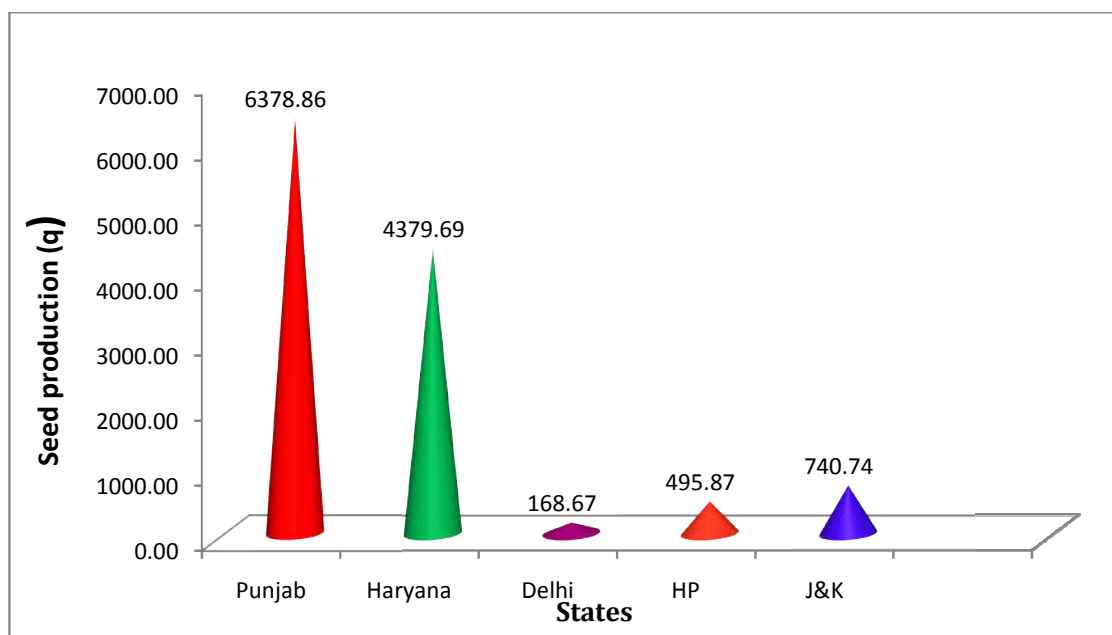
State	Seeds			Planting Material		
	Quantity (q)	Value (Rs. in lakh)	Farmers (No.)	Quantity (lakh)	Value (Rs. in lakh)	Farmers (No.)
Punjab	6378.86	186.35	41737	0.77	0.87	828
Haryana	4379.69	79.28	1792	1.77	0.53	20
Delhi	168.67	6.86	3459	-	-	-
Himachal Pradesh	495.87	18.30	2035	5.51	9.35	6557
Jammu & Kashmir	740.74	15.46	2711	1.16	3.45	4648
<b>Total</b>	<b>12163.83</b>	<b>306.24</b>	<b>51734</b>	<b>9.21</b>	<b>14.19</b>	<b>12053</b>

#### 3.1.5.1 Seeds

KVKs in Punjab have produced the highest quantity (6378.86 q) of seeds followed by KVKs of Haryana, Himachal Pradesh, Jammu & Kashmir and Delhi( Table:-----) and Fig-----). The KVKs of Haryana supplied the produced seed to **cooperative societies and state department of seed** for distribution among the farmers. Out of total quantity of seed produced, the highest quantity was on cereals(11333.44) followed by oilseeds, fodder, pulses, vegetables, commercial crop, others and spices.

**Table: Crop category wise production of seeds**

Crop category	Quantity (q)	Value (Rs. in lakh)	Farmers (No.)
Cereals	11333.44	248.47	26143
Oilseeds	244.11	12.90	5828
Pulses	174.04	8.94	808
Commercial crops	52.57	2.74	671
Vegetables	149.89	14.19	16522
Spices	0.77	0.06	66
Fodder crop seeds	190.92	18.44	1167
Others (Sunhemp& Mushroom)	18.10	0.49	529
<b>Total</b>	<b>12163.83</b>	<b>306.24</b>	<b>51734</b>



**Fig. State wise seed Production (q)**

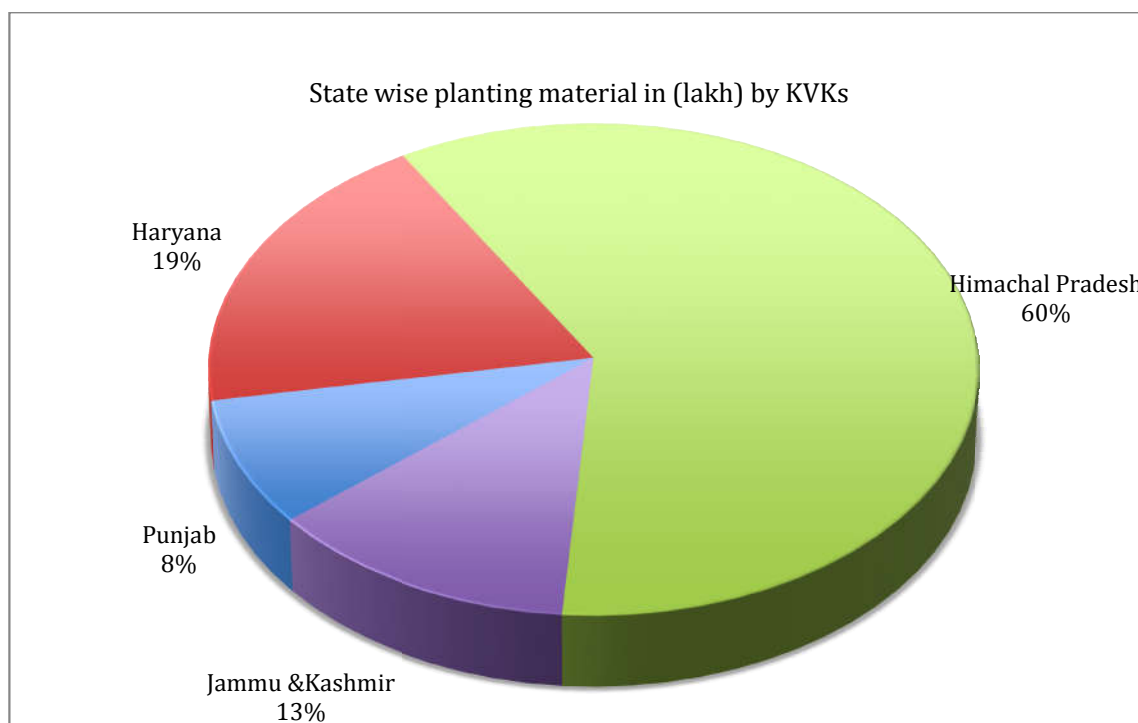
### 3.1.5.2 Planting materials

KVKs in Himachal Pradesh have produced more number of planting materials of crops (5.51 lakh) followed by KVKs in Haryana, Jammu & Kashmir and Punjab (Table and Fig. -----). Out of total 9.21 lakh planting material 6.84 lakh were vegetable seedling and the rest were fruit crops, flower crops, plantation crops, fodder slips and agro forest plants.(Table ----).

**Table: Crop category wise production of planting materials**

Crop category	Quantity (lakh)	Value (Rs. in lakh)	Farmers (No.)
Vegetable seedlings	6.84	3.60	8911
Fruits	0.59	9.41	2972
Flowers	0.42	0.13	19
Plantation crops	0.50	0.25	56
Fodder crop saplings	0.84	0.51	85
Forest species	0.02	0.28	10
<b>Total</b>	<b>9.21</b>	<b>14.19</b>	<b>12053</b>

**Fig.: State-wise planting material in (lakh) by KVKs of Zone-I during 2013-14**(Needs revision)



**Fig:**

### 3.1.5.3 Bio-Products

KVKs in Himachal Pradesh have produced the highest quantity of bio-products followed by KVKs in Haryana and Jammu & Kashmir. Out of total bio-products highest quantity of bio-fertilizers were produced followed by bio-product (Pheromone Traps) for demonstration among farmers of Himachal Pradesh supplied by KVK Mandi. (Table :-----)

**Table: State wise production of bio-products**

State	Quantity (q)	Quantity (No.)	Value (in lakh)	Farmers (No.)
Haryana	12.55	--	0.07	114
HP	17.26	3438	5.08	863
J&K	5.005	--	0.01	5
<b>Total Zone</b>	<b>34.82</b>	<b>3438</b>	<b>5.16</b>	<b>982</b>

**Table: Category wise production of bio-products**

Category	Quantity (Kg/No.)	Value (in lakh)	Farmers (No.)
Bio-fertilizer(q)	34.82	1.72	982
Bio-Agents(No.)	3438	3.44	--
<b>Total</b>		<b>5.16</b>	<b>982</b>

**3.1.5.5 Livestock and fisheries**

KVKs in Haryana have produced more quantity of livestock material and fisheries (91991numbers) followed by Jammu & Kashmir, Punjab and Himachal Pradesh. Out of the total production of livestock materials and fisheries, more quantity (91100) was under fisheries followed by poultry and dairy (Table: ).

**State-wise production of livestock materials and fisheries**

State	Quantity (No.)	Value (Rs. in lakh)	Farmers (No.)
Punjab	141	0.10	1
Haryana	91991	3.95	80
Himachal Pradesh	11	0.24	10
Jammu & Kashmir	1534	2.07	300
<b>Total</b>	<b>93677</b>	<b>6.36</b>	<b>391</b>

#### **Quality technological products**

**KVKs have produced and supplied 12163.83 q of seed of different crop varieties, 9.21 lakh number of planting material of different crops , 34.82q of bio-fertilizer, 3438 bio-agents and 93677 of livestock strains and fish fingerlings benefiting 0.65 farmers of realized an amount of Rs. 331.95 lakhs in the Zone.**



**Fig: Planting material being produced in the nursery at KVK Bilaspur**





### 3.1.9 Soil, Water and Plant Analysis

A total of 50 KVKs have established soil, water and plant testing laboratory and carrying out the analysis for the benefit of farming community. Further, KVKs are also utilizing this facility for carrying out the soil test based nutrient recommendation for conducting FLDs and OFTs as well rendering advisory services on nutrient based recommendations to the farmers. During the year, a total of 20890 samples of soil, water and plant were received from 14240 farmers belonging to 6914 villages were analyzed (Table-----) and realized an amount of Rs.3.41 lakh.

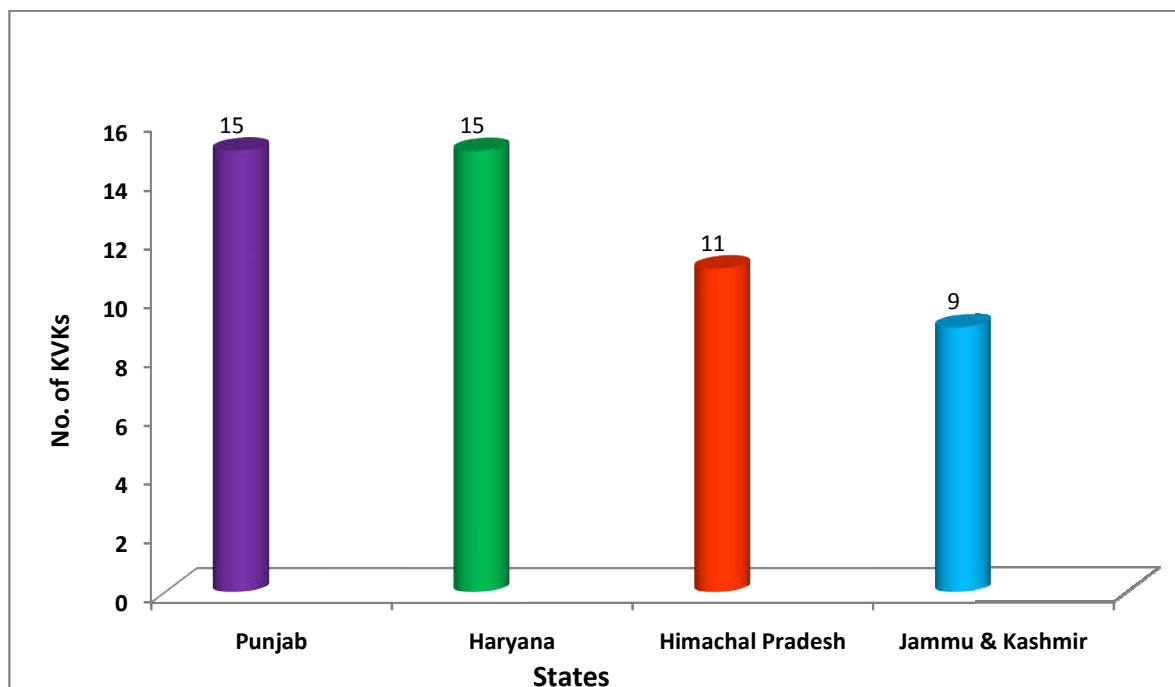
**Table: Work progress of SWPTL**

Type of sample	No. of samples	No. of farmers	No. of villages	Amount realized (inRs.)
Soil	13340	8779	3111	258204
Water	4241	3201	2142	47820
Plant	3309	2260	1661	34545
<b>Total</b>	<b>20890</b>	<b>14240</b>	<b>6914</b>	<b>340569</b>

State wise data showed that KVKs in Haryana have analyzed more samples (9689) belonging to 5871 farmers of 3664 villages. (Table)

**Table: State wise soil, water, plant analysis undertaken**

State	No. of samples	No. of farmers	No. of villages	Amount realized(Rs.)
Punjab	6365	4130	2280	125600
Haryana	9689	5871	3664	28270
Delhi	50	50	20	-
Himachal Pradesh	2876	2553	551	23699
Jammu & Kashmir	1910	1636	399	163000
<b>Total</b>	<b>20890</b>	<b>14240</b>	<b>6914</b>	<b>340569</b>



**Fig. Number of Soil & water labs in the KVKs**

### **3.1.10 Rainwater Harvesting Units**

Rainwater harvesting unit with micro irrigation system was established in 4 KVKs i.e. Gandarbal, Bilaspur, Hamirpur and Solan. A total of 13 training courses were conducted during 2013-14 utilizing this facility and produced 0.22 lakh planting materials. Further 835 farmers and 69 officials visited these units and got acquainted with the rainwater harvesting techniques.

### **3.1.11 Convergence and Linkages**

KVKs work in collaboration with different line departments and organizations of the State and Central Government; well reputed NGOs working on different aspects of agriculture and rural development for sharing experiences and expertise. Such collaborations with line departments will help the KVKs in arranging resources for carrying out different extension activities and developing demonstration and training infrastructure. The organizations having linkage and collaboration with KVKs have been listed in Table 1. Besides, many KVKs are working in collaboration with Agricultural Technology Management Agency (ATMA) and National Horticulture Mission (NHM). Under NHM, the KVKs of Gurdaspur and Bathinda provided Gardener's Training Course for six months; KVKs of Punjab provided vocational trainings on bee keeping while KVKs of Himachal Pradesh and Jammu & Kashmir provided trainings on different aspects of protected cultivation, horticulture and off-season cultivation of vegetables.

KVKs have utilized an amount of Rs.1.63 crore under National Horticulture Mission for the benefit of the farming community. KVKs provided training and created awareness among farmers on fish rearing practices in collaboration with fisheries development board in order to encourage fish farming among the water logged areas in south west of Punjab.

**Table1 : List of organizations having linkage and collaboration with KVKs**

<b>Sl.No.</b>	<b>Organization/Departments</b>
1.	Agriculture department
2.	Agriculture Technology Management Agency
3.	Non-government Organizations
4.	State Government Departments (Block Development Office, Department of Horticulture, Department of Animal Husbandry, Dairy Development Board, Department of Soil & Water Conservation, Punjab Energy Development Agency, Punjab State Farmers Commission, Child Development Project Office, Sheep Development, Social Justice Association of Ladak, )
5.	State Agricultural Universities
6.	ICAR Institutes (CIPHET, Ludhiana; CPRI, Shimla; DWR, Karnal; NDRI, Karnal; DMR, Solan; DMR, New Delhi, CSSRI, Karnal, Central Research Institute for Dryland Agriculture, Hyderabad and CITH, Srinagar)
7.	Central Government Departments and schemes (Central Poultry Development Organization, Central Warehouse Corporation, Integrated Rural Development Programme, Integrated Watershed Development Project, Integrated Watershed Management Programme, KDP- <i>Kargil</i> Development Project, Mahatma Gandhi National Rural Employment Guarantee Act, RasthtriyaKrishiVikasYojna, Indian Farmers Fertilizer Cooperative Limited; National Centre for Integrated Pest Management, National Committee on Plasticulture Application in Horticulture; North India Technical Consultancy Organization, National Medicinal Plants Board, NSC- National Seed Corporation and Department of Social Welfare)
8.	Financial Institutes (National Bank for Agriculture and Rural Development (NABARD), State Bank of India and Punjab National Bank)
9.	Other organizations (Punjab State Seed Certification Authority, Cereal Systems Initiative for South Asia and SriRatan Tata Trust)
10.	Nehru Yuva Kendra
11.	Training Institutes (State Agricultural Management and Extension Training Institute (SAMETI), Rural Self Employment Training Institute (RSETI))

#### **Department of Agriculture**

- Help KVK in identification of participants for trainings, supporting implementation of FLD, OFT, trainings, technology week, farmers field school, FLD - field day, farmers-scientists interactions and interface meeting
- KVKs involve in joint diagnostic survey, joint field inspection at times of pest and disease outbreaks, contingency crop planning, *kharif* and *rabi* campaigns and soil testing campaigns.
- Provide technical back up for implementing RKVY, NHM and ATMA programmes, farm school and organize in-service training to field functionaries.

- Serve as resource persons in the off campus training programmes of the department, workshops, and seminars.
- Provide farm advisory services, help in input procurement, supply seeds and planting materials, agricultural exhibitions and seminars at block and district level.

#### **State Government Departments/Schemes**

- Database on stakeholders of various schemes and preparation of vision plan for the district.
- Financial support for projects of KVKs in the areas of vocational training, organize study tour and technology dissemination.
- Establishment of farm machinery for custom hiring, soil and water conservation in KVK farm as well as in farmer's fields in KVK cluster villages.
- Purchase of seeds and planting material of KVKs.
- Trainings & exposure visits on non-conventional sources of energy.

#### **Non-Government Organizations (NGOs)**

- Conducting training programme, PRA, technical support, collaboration for conducting training programmes, field days, and seminars and for arranging melas.
- Project formulation and technical assistance for starting micro enterprises.
- Collaborative linkage to conduct vocational trainings on income generation activities to their SHGs.

#### **Horticulture Department**

- Joint diagnostic survey, training farmers and extension functionaries, implementation of NHM and NHB activities, precision farming programme, post harvest technology and value addition.
- Collaboration for conducting training programmes, campaigns, exhibitions, field days, seminars.
- Guidance to students for their Rural Horticultural work experience programme.
- Farm advisory services.
- Participation in mass contact programmes and flower shows.

#### **Panchayat Raj Institutions - Village/Gram Panchayat and ZilaPanchayats**

- Support in identifying the farmers and conducting KVK mandatory programmes.
- Sponsoring trainees, financial assistance for the continuation of group approach to solve problems that need community mobilization and organizing soil-testing campaigns.
- Infrastructure development, trainings for self-employment among rural youth.

#### **State Agricultural Universities**

- KVK gets technical, financial and administrative support in developing infrastructure facilities.

- Help KVKs in selection of latest viable technologies for OFT and FLD, material for field trials, pre trial test of new varieties in KVK farms, supply of critical inputs for selected technologies, technical back-up and exposure visits.
- KVKs provide feedback on researchable issues received from ATMA.
- Participate in SAC meetings and help KVK in implementing suggestions related to technical problems.

#### **Central Government Department Ministries and Schemes**

- Financial assistance for plant health clinic & seed production unit and infrastructural development of KVK.
- Guide the local officials in implementing central government scheme by facilitating better understanding of schemes guidelines.
- Linking entrepreneurs to schemes and facilitate them to avail subsidy and other scheme benefits
- Collaborative training programme on food grain storage.

#### **NABARD**

- Assistance for conducting trainings, village adoption & for income generating activities of trainees, formation of farmers groups.
- Collaborating in entrepreneurship training programmes.
- Financial support for research project under rural innovation fund & farmers technology transfer fund and funding of VVV Clubs formed by KVK.
- Agriculture and rural credit assistance, loan for setting up of agri-enterprises. .

#### **Banks, Cooperatives and Financial Institutions**

- Extend financial assistance to SHGs formed/ trained by KVK to establish small-scale enterprises.
- Provide assistance for conducting trainings, exposure visits, village adoption, field days, seminars and entrepreneurship development programmes.
- Funding of kisanmelas organized by KVK and extending loan to KVK beneficiaries.
- Participate as resource person in entrepreneurial development programmes
- Support KVK infrastructural development so that KVKs undertake capacity building of bank officials.

#### **Animal Husbandry Department**

- Joint veterinary camps, participating in assistance to state control of animal diseases meetings, collaborative linkage for conducting camps and vaccination programmes.
- Technical assistance in demonstration, OFT, data related to livestock population and problems, input for FLD.
- Organize training programmes on Integrated Farming System, cattle rearing, poultry and quail farming utilizing their expertise.
- Guidance to students for their rural agricultural work experience programme.
- Farm advisory service.
- Impact analysis.

**ICAR Institutes**

- Participate in SAC meetings, extension functionaries training programme and guide KVKs in formulating the OFT and FLD programmes.
- Source of technology, technical expertise and inputs to FLDs, OFTs and training.
- Support KVKs in conducting farmer scientist interaction, field visit for laying out OFTs.
- Project support to resolve localized problem, soil fertility mapping and strengthen infrastructure facilities of KVK.
- Establishing market linkage and formation of commodity groups.
- Exchange of experts as resource person for training programme

**Media**

- Participating in farm radio programmes, broadcasting KVK's programmes, announcements, news, answers to questions raised by farmers to the AIR and radio talks.
- Telecasting farmers' field problem solving technologies, technology dissemination & publicity.
- News coverage in newspapers, publication of technical and popular articles in print media.
- Success stories on KVK activities.
- Participation in rural advisory committee meetings
- Publicity to collaborative activities, arrangements while organizing exhibitions, off campus training programmes, field days and other extension activities.

**Farmers Associations and Groups**

- Arrange diagnostic services, chemicals, seeds and other input at reasonable rate on credit basis for initiating frontline demonstrations and OFTs.
- Participation in farmers' day, Zonal Workshop, sponsored training, and skill up-gradation programmes.
- Joint implementation, inspections and promotional meetings of successful technologies.

**Fisheries Department**

- Farmers identification for conducting FLD on integrated fish farming, sponsoring KVK training programmes related to fisheries development, stunted fingerlings technology adoption and joint implementation and monitoring of departmental schemes.
- Supply of fish fingerlings.

**Agricultural Technology Management Agency (ATMA)**

- Helping the KVK in assessing the training needs of the farmers in areas of crop improvement, production, protection and mechanization,
- Provide researchable issues and training needs of farmers and extension personnel to initiate appropriate technical interventions including feedback to research system, OFT, FLD, training etc.
- Collaborate in introduction and popularization of new crops and new practices in the district, carryout soil testing campaigns.
- Serve as technology dissemination centre for ATMA farmers and facilitate exposure visit to KVK farm.
- Financial assistance for construction of model nursery, organizing technology week, Farmers-Scientists interactions,
- Help in commodity group identification and support them with technical and managerial skills.

- Identification of awardees farmers to get them organize farm schools, provide technical expertise during farm school interactions, kisangosthi etc.
- Participate in ATMA Management Committee and Governing Body meetings.

#### **Watershed Department**

- Conducting training programmes, joint diagnostic survey, IPS demonstration, seminars and field days.
- Conducting trainings to rural youth on entrepreneurship development programmes.

#### **District Collector/ Dy. Commissioner**

- Financial support for KVK infrastructure and AV aids
- Participate in monthly review meetings of ATMA, NADP, grievance day meeting, agricultural production council meeting, Special team constituted by district collector to evaluate the sugar factory effluent treatment and gravel quarry of plantations, periodical technical / consultative meeting.
- Serve as member, micro irrigation committee and executive member - national food security mission committee.

#### **Nehru Yuvak Kendra's**

- Collaborative training programme for rural youth capacity building sponsored training and identification of trainees.

### **3.1.13 Awards and Recognition**

**3.1.13.1 Best Zonal KrishiVigyan Kendra award 2012:** KVK Mandi was conferred with best KVK award of ICAR for Zone-I for the year 2012 during Eighth National Conference on KVKs held in Bengaluru based on the outstanding achievements in the field of agricultural extension. This award was presented in recognition of the role played by the KVK in developing role models and leader farmers as well as women. Location specific technology assessment and refinement of technologies were done in the area of varietal evaluation, IDM, resource conservation, INM, IPM, IWM and value addition. Based on OFTs conducted under various thematic areas, paddy hybrid *HRI -152*, Modified system of rice intensification, Wheat variety *HPW 236*, Coloured capsicum cultivars viz. *Natasha* and *Swarna* as recommendation and eco friendly fruit fly management through fruit fly traps are some of the recommendations that have been included in the package of practices of CSKHPKV, Palampur. KVK – *KrishakMitras* – Farmers model; one scientist-one village programme as innovative tools for effective transfer of technologies in the district.

Diversification of agriculture through protected cultivation, off-season vegetables especially pea, cabbage and exotic vegetable cultivation in wet temperate region resulting in remunerative returns that has significantly improved the socio-economic status of the farm families. KVK has also made significant contribution through group mobilization of women self-help groups towards secondary agriculture that has created new opportunities for farmwomen to earn additional income. Scientists of KVK Mandi have been awarded



*Himalaya ShriSamman* by SamajKalyanavamVikasMandal, Himachal Pradesh during 2010 for pioneer work in popularization of System of Rice Intensification (SRI) in paddy in Mandi district of HP.



**3.1.13.3 Other awards:**Dr. Upasana Singh, Programme Coordinator, KVK, Ambala awarded on 12-10-2013 for her contribution in the field of poultry training and empowerment of farm women through poultry. KVK Ambala was sanctioned back-yard poultry project for organizing of poultry training from Central Poultry Development Organization (NR), Chandigarh. KVK Ambala helped the farmers in replacement of *Desi* breed of back-yard poultry with improved breeds (CARI *Nirbheek*) in rural areas. KVK Ambala prepared training module and conducted On Farm Trials & Frontline Demonstrations on back-yard poultry. Trainings organized for Mid-hill Project & SWAN Project of Himachal Pradesh (different districts) in back-yard poultry. KVK Ambalaprovided practical training to many farmers and farmwomen and 1884 improved breeds (CARI *Nirbheek*) of 42 days. At present, back-yard poultry units are working in adopted villages and earning monthly income of Rs.800-1200.



11. National Award for the year 2013 Dr. Upasana Ph. D . (Project, Co-ordination KVK, Tepla District Ambala (Haryana))



### Progressive Farmers from Zone-I Awarded

A Global Agri-Business Summit: Vibrant Gujarat was organized by state of Gujarat inGandhinagar on 9-10<sup>th</sup>September, 2013 in which progressive farmers from 10 districts were awarded in the contribution in agriculture and allied fields. Mr. Ishtiaq Ahmed Khan a progressive farmer of KVK, Poonch (Jammu & Kashmir) was awarded “Best Farmer Award in Vegetable Production” for adoption of innovative techniques in vegetable cultivation. Sh. PremLalNadda a progressive farmer of KVK, Bilaspur (Himachal Pradesh) was awarded for cultivation of exotic vegetables like broccoli, brussels sprout, cherry tomato, celery, snowbean etc. Smt. GurdipKaur a progressive farmwoman was awarded in allied agricultural occupations. She prepares various squashes, jams and pickles from seasonal and locally

available fruits and vegetables. She has also established a Soy Processing Plant in 2010 in which soymilk, tofu, soy atta and soy nuts are produced and sold under the brand name of *Protein Shakti*. Her unit has also been registered under FSSAI (Food Safety & Standards Act of India). The farmers were presented with a cash prize of Rs.51,000 along with a shawl and certificate of appreciation.

Sh. Amrik Singh, a progressive farmer of village Hajwana, in Distt. Kaithal was awarded on 9 Jan, 2014 at State level function for Best Farmer Award *Organic Farming Mein UtkrishtPardrashan*. The award was given by Sh. Bhupinder Singh Hooda, Chief Minister Haryana on the occasion of *KisanSammelan* organized at Jhajjar with cash award Rs.50,000.



### 3.2 Agricultural Technology Information Centres

The Indian Council of Agricultural Research (ICAR) established Agricultural Technology Information Centres (ATICs) during X Five Year Plan with the mandate of providing technology services, input services and information services to the farming community based on single window system. The state wise data base of ATICs established and functioning in are given in Table and the services provided by these ATICs are given in ensuing paragraphs.

**Table : Agricultural Technology Information Centres**

States	SAUs	ICAR Institutes	Total
Punjab	1	-	1
Haryana	1	1	2
Delhi	-	1	1
Himachal Pradesh	2	1	3
Jammu & Kashmir	1	-	1
<b>Total</b>	<b>5</b>	<b>3</b>	<b>8</b>

**3.2.1 Technology services:** A total of 263042 farmers visited these eight ATICs out of which 64705 farmers visited for technical advice, 28331 farmers came as part of study tours and 170006 farmers for purchase of technology inputs. A total of 192497 books and technical bulletins based on latest agricultural technologies, 603 CDs, technology inventory, video films, audio CDs were made available for farmers at ATICs benefitting 51026 farmers and generated revenue of Rs. 23.40 lakh for ATICs.

**3.2.2 Inputs provided:** Technological inputs provided to farmers by the ATICs include seeds (11129.45 q), planting materials (655798 numbers) and bio-products (25.96 q).

**3.2.3 Information provided:** ATICs replied 171 letters received from farmers and answered 20021 telephonic calls to help farmers on technological queries. ATICs also conducted 8211 video shows to convince farmers on latest technologies. Besides, 5297 farmers were trained to build their skills to adopt innovative ideas and techniques promoted by the ATICs.

Through the above services, the ATICs have earned total revenue of Rs.7.65 crore.

**Table: Details of activities conducted by ATICs**

ATIC	Farmers visit for technical advice	Farmers visit for technology products	Phone calls from farmers	Books distributed	Technical bulletins	Soil & Water testing samples
PAU, Ludhiana	11997	136799	2056	46460	116548	409
CCSHAU, Hisar	4500	4000	3670	7340	145	-
IARI, New Delhi	29821	15327	7872	-	-	68
CPRI, Shimla	618	-	100	1646	2490	-
NDRI, Karnal	15970	2401	5681	1545	252	-
SKUAST Srinagar	265	7487	35	1123	1832	34
Dr.YSPUH&F, Solan	1238	1238	324	4817	-	705
CSKHPKV, Palampur	296	2754	283	6355	1944	-
<b>Total</b>	<b>64705</b>	<b>170006</b>	<b>20021</b>	<b>69286</b>	<b>123211</b>	<b>1216</b>

### 3.3 Technological Backstopping by Directorate of Extension

KVKs are being provided with enough technological backstopping in agriculture and its allied sectors through Directorate of Extension Education located in seven State Agricultural Universities viz., PAU, Ludhiana; GADVASU, Ludhiana; CCSHAU, Hisar; Dr. YSPUH&F, Solan; CSKHPKV, Palampur; SKUAST, Jammu and SKUAST, Srinagar.

The Directors of Extension and their officials coordinate and monitor the mandated activities of all the KVKs under their jurisdiction through Scientific Advisory Committee meetings, workshops, review meetings, field visits and organize human resource development programmes for KVK staff on frontier areas of technologies. Further they also provide technological products like improved seeds, planting materials, livestock, poultry and fisheries breeds to various KVKs as per their farmer's requirements.

During the year 2013-14 Directors of Extension and their officials have participated in 98 Scientific Advisory Committee meetings, 75 field days, 107 training programmes and 19 Technology Week. In addition they have attended in 44 other programmes including farmers meet, animal health camp, inauguration of knowledge and resource centre in villages etc. They have also organized 32 workshops/seminars in which KVK staff had participated. (Table-1)

Directorates of Extension have also monitored the activities of KVKs through 32 programmes including workshops/review meetings, action plan meetings, sensitization meetings, regional committee meetings, crop specific awareness programmes etc. In addition they also have made field visits to 138 plots wherein on farm trials were conducted, 185 plots of frontline demonstrations and participated in 50 training programmes conducted by the KVKs.

In order to provide technological backstopping on latest technologies in agriculture and its allied sectors, the Directorates of Extension have also organized 107 training programmes. The thematic areas covering these training programmes include

- rainfed farming
- processing and value addition
- climate change effects and its management
- market-led extension management and market intelligence
- participatory watershed management
- promotion of Integrated Nutrient Management, Integrated Pest Management and Integrated Disease Management and precision farming technologies
- participatory seed and forage production
- conservation and utilization of natural resources
- role of livestock in integrated farming system, clean milk production, nutritional security etc.

Directorates of Extension also serve as source of technologies for the KVKs and provide technological inputs such as seeds of high yielding varieties and hybrids, planting materials, livestock and poultry breeds etc.

**Table : Details of activities conducted by Directorates of Extension Education of SAUs**

Directorates of Extension Education	Scientific Advisory Committee attended	Field Visits	Training Programmes organized	Technology week	Field Days
PAU, Ludhiana	34	47	17	4	8
GADVASU, Ludhiana	-	-	2	-	-
Dr. YSPUH&F, Solan	4	8	-	-s	2
CSKHPKV, Palampur	15	10	4	1	3
CCSHAU, Hisar	28	48	23	5	14
SKUAST, Jammu	5	13	32	1	22
SKUAST, Srinagar	12	12	29	8	26
<b>Total</b>	<b>98</b>	<b>138</b>	<b>107</b>	<b>19</b>	<b>75</b>

## Chapter 4

### HUMAN RESOURCE DEVELOPMENT

Human Resources are the greatest asset of every nation. Therefore, Human Resource Development (HRD) is a relatively modern management term used to describe the individuals who make up the trained manpower of an organization. Hence, it is important to implement HRD programmes to keep employees abreast with the latest technological development, acquiring specific technical knowledge and skill and update in their subject matter as to make them efficient to carry their assignments in the organization as well as for their career development. Hence, employees and staff are conscious of the importance of HRD. In this direction, this Directorate has taken many capacity building programmes for the benefit of KVK staff and the details are presented in Table :---

The upliftment of the farmers can be achieved through specialized training of the staff of KVKs in upcoming latest agriculture knowledge.

**Table: Details of HRD programmes organized by Zonal Project Directorate**

Organizing Agency	Training Programme	No. of Days	No. of Participants	No. of KVKs Involved
ZPD	State Level Action Planning Workshop of KVKs of Punjab (3 <sup>rd</sup> April, 2013)	1	111	20
	Sate Level Action Planning Workshop of KVKs of Haryana & Delhi (6 <sup>th</sup> April, 2013)	1	131	19
	Brain Storming Session on Extension Research (26 <sup>th</sup> April, 2013)	1	45	10
	Review-cum-action Planning of KVKs of Zone-I under NICRA Project 9 <sup>th</sup> May, 2013	1	40	12
	Zonal Workshop-cum-Training Programme of KVKs of Zone-I (5 <sup>th</sup> -7 <sup>th</sup> July, 2013)	3	105	67
	Training Programme on Kisan Mobile Advisory for KVKs of Haryana (18 <sup>th</sup> September, 2013)	1	49	19
	Review-cum-Planning Meeting on Hydrogel Technology (24 <sup>th</sup> September, 2013)	1	39	12
	Review Meeting of NICRA KVKs (4 <sup>th</sup> October, 2013)	1	27	12

	Training of Kisan Mobile Advisory for KVKs of Punjab (18 <sup>th</sup> November, 2013)	1	45	20
	Annual Action Plan Meeting of KVKs of Punjab (3 <sup>rd</sup> -4 <sup>th</sup> March, 2014)	2	73	20
	<b>Total</b>		<b>665</b>	

KVK staff has also participated in HRD activities conducted by other institutions through their respective host organizations. During the year, 2013-14, 137 KVK staff attended different training courses of different duration viz., short, medium and long duration as a part of HRD programme organized by NARS in the country on the thematic areas viz., precision farming, successful cultivation of vegetable crops, entrepreneurship development, agro processing and value addition of agriculture products, information and communication technology, agricultural marketing, Integrated Crop Management, Integrated Pest Management, Integrated Disease Management, seed technology, bio- diversity, process documentation, Integrated Farming Systems, production and management of livestock and fisheries etc.

**Table:Details of HRD programmes organized by SAUs, ICAR Institutes, and State government organizations for the KVK staff**

Organizing Agency	Training Programme	No. of Days	No. of Participants	No. of KVKs Involved
IARI, New Delhi,	Workshop on IARI-Post Office Linkage Model: Experience Sharing and Mechanism of Expansion, (21 <sup>st</sup> March, 2013)	1	10	10
Jalgaon, Maharastra,	International Conference on Water Quality and Management for Climate Resilient Agriculture, (28 <sup>th</sup> -31 <sup>st</sup> May, 2013)	4	3	3
Bihar Agricultural University	Short Course on 'Recent Trends in Educational Technology for quality learning (1 <sup>st</sup> -10 <sup>th</sup> June, 2013)	10	2	2
(SAMETI), Pantnagar, Uttarakhand	Training Programme on Leadership for Innovation in Agriculture, (24 <sup>th</sup> -28 <sup>th</sup> June, 2013)	5	4	4
S D Agricultural University, S.K. Nagar, Gujarat	20 <sup>th</sup> Annual AICRP-Rapeseed Mustard Group Meeting, (5 <sup>th</sup> -7 <sup>th</sup> July, 2013)	3	2	1
KVK, Kochi, Kerala	Training Programme on Recent Advances in Aquaculture for Popularization through KVKs.(15 <sup>th</sup> -20 <sup>th</sup> July,2013)	6	1	1
MANAGE, Hyderabad	Write- Shop for Success Stories (19 <sup>th</sup> -23 <sup>th</sup> August, 2013)	5	5	5
MANAGE, Hyderabad	Project Planning and Management using MS-Project (26 <sup>th</sup> – 30 <sup>th</sup> August, 2013)	5	5	5
Dr. Y.S. Parmar University of Horticulture and Forestry, Solan	Recent approaches for breeding and production of vegetable crops ( 20 <sup>th</sup> August-9 <sup>th</sup> September, 2013)	21	8	8
Indian Institute of Public Administration (IIPA), New Delhi	Knowledge management & Knowledge sharing in Organizations (9 <sup>th</sup> -13 <sup>th</sup> , September, 2013)	5	4	4
National Institute for Micro, Small and Medium Enterprises	Entrepreneurship Development (16 <sup>th</sup> -20 <sup>th</sup> September, 2013)	5	1	1

(ni-msme), Hyderabad				
Central Institute of Agricultural Engineering, Bhopal	Training Programme on Soybean Processing, (23 <sup>th</sup> -27 <sup>th</sup> September, 2013)	5	8	8
Central Rainfed Upland Rice Research Station (CRURRS), Hazaribagh	Training Programme on DSR, (27 <sup>th</sup> -28 <sup>th</sup> September, 2013)	2	5	5
DMR, Solan	Mushroom Cultivation Technology (18 <sup>th</sup> - 24 <sup>th</sup> October, 2013)	7	6	6
Indian Veterinary Research Institute, Izatnagar	Empowerment of farming communities through hybrid communication tools (21 <sup>th</sup> -30 <sup>th</sup> October, 2013)	10	4	4
Central Institute of Agricultural Engineering, Bhopal	Soya bean processing (18 <sup>th</sup> -22 <sup>th</sup> November, 2013)	5	1	1
Shangri-La Hotel, New Delhi,	Innovative Technologies & Good Agricultural Practices (22 <sup>th</sup> November, 2013)	1	6	6
IARI, New Delhi	Integrated farming systems for enhancing resource-use efficiency and livelihood security of small and marginal farmers (20-27 December, 2013)	8	8	8
Central Institute of Agricultural Engineering, Bhopal	Training Programme on Soybean Processing (25 <sup>th</sup> -29 <sup>th</sup> November, 2013)	5	6	6
ICAR Research Complex for Eastern Region, Patna	Showcasing of agricultural Technologies (6-7 <sup>th</sup> December, 2013)	2	10	10
PAMETI, Ludhiana	Training on “Application of ICTs in Modified Agricultural Extension Reforms”, (17-20 December, 2013)	4	9	9
NIPHM, Hyderabad	Training on “Fundamentals of Plant Health Management for Plant Health Doctors” (17.01.2014 – 06.02.2014)	21	4	4
Dr. Y.S Parmar University of Horticulture and Forestry, Solan	National Symposium on “Mushroom for medicinal value and nutritional security under changing climatic conditions” (27-28, December, 2013)	2	17	17
IARI, New Delhi	World Water Day-2014 (22March 2014 )	1	8	8
			137	

A total of 802 KVK staff underwent HRD programmes during the year 2013-14 on various aspects of agriculture and allied sectors organized by Zonal Project Directorate, Zone –I and SAUs, ICAR institutes and different state government organizations in the country.