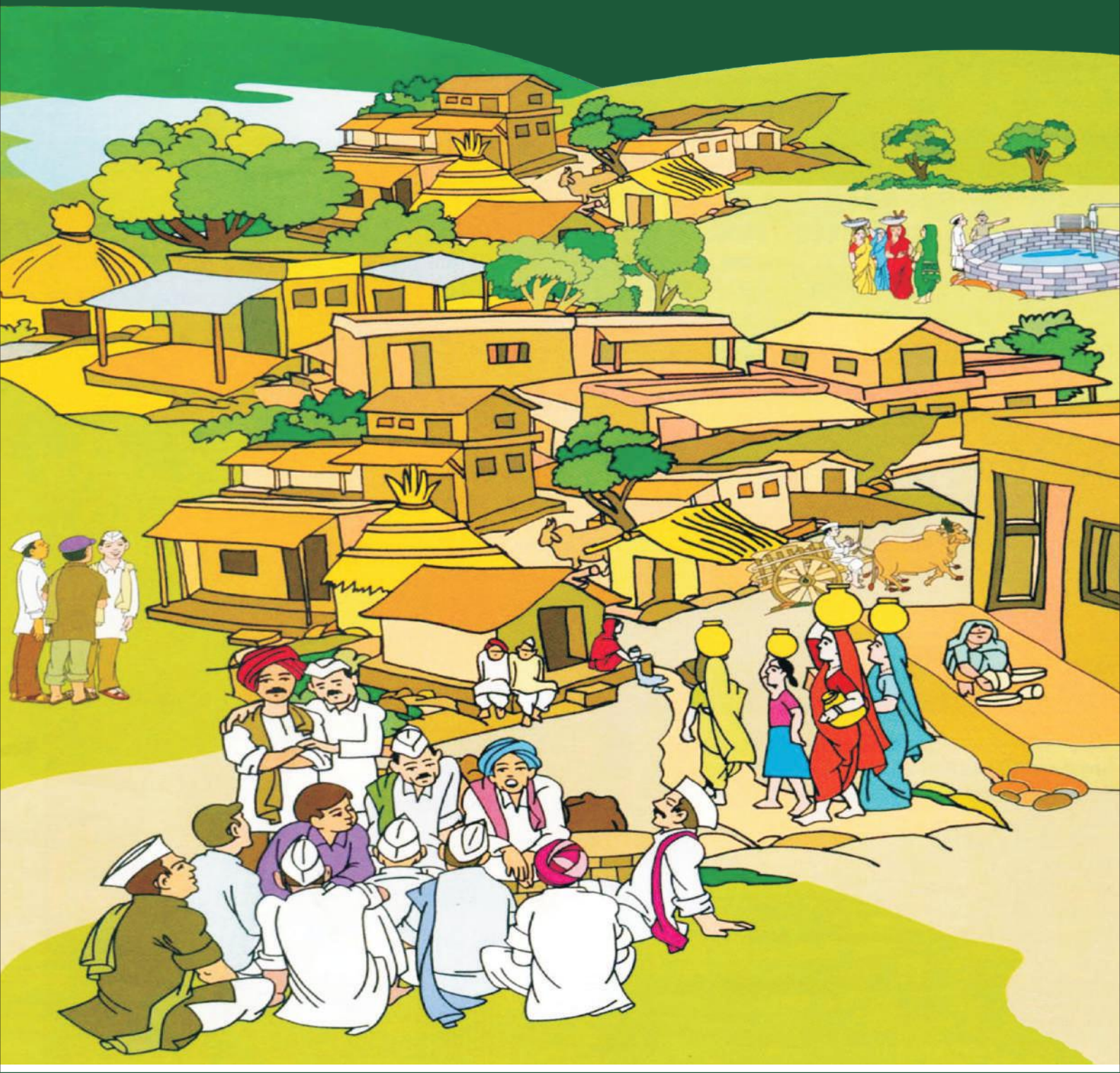
Sustainable Transformation



Annual Report

2015-2016

Dilasa Janvikas Pratishthan

Sustainable Transformation

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Dilasa Janvikas Pratishthan

Aurangabad

Contents

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Brief about Organization

Dilasa Janvikas Pratishthan is an organization dedicated for the rural development and makes the seal of its presence in watershed development and women empowerment. Presently, it is working in 5558 villages of Maharashtra state. The organization has established its offices in Nasik, Pune, Sindhudurg apart from its main office at Aurangabad.

The Awards of Dilasa

- ***Bhoomijal Samvardhan Award*** for adopting Innovative Practices of Ground Water Augmentation
- ***John D. Rock Feller Scholarship*** is the first time when scholarship is awarded to the NGO.
- ***Vanashree Award*** for remarkable plantation work with developed simple activity of seed sowing.
- ***Jalsandharan Award*** for its successful work in watershed development.
- ***National Award*** for Innovations in watershed development.
- ***Mahatma Phule Jal-Bhumi Abhiyan Puraskar*** for remarkable work in soil and water conservation.
- ***Sinchan Mitra Puraskar*** for completion of 25000ha. soil & water conservation work.
- ***IWWA Award*** for remarkable contribution in the field of water supply.
- ***Water Digest Award*** for outstanding contribution in the field of water.

Lead role of the organization

- **Resource Support Organization** in Indo-German Watershed Development Programme (IGWDP)
- **Resource Support Organization (RSO)** in NABARD supported Integrated Watershed Development Programme (NHWDP)
- **Resource Support Organization (RSO)** in Watershed Development Fund (WDF)
- **State Resource Organization (SRO)** in Livelihood, FPO, Skill Development, etc. for IWMP programme.
- **Resource Institute (RI)** for Small Farmers Agriculture Consortium (SFAC)
- **Producer Organization Promoting Institute** (POPI) for NABARD supported FPOs.
- **Service Provider** for Farmer Common Service Center (FCSC) FPOs for Maharashtra Agricultural Competitiveness Programme (MACP)
- **State Level Accredited Monitoring Organization** for Monitoring, Evaluation, Learning and Documentation (MELD) of IWMP Programme in Nasik Agriculture Division.
- **Monitoring Agency for Jalyukta Shivar** of Maharashtra State.
- **Monitoring Agency for Hariyali,** IWDP, DPAP watersheds of Maharashtra state.
- **Empanelled Monitoring Organization of YASHADA** for various government schemes.

Feather in our cap

- Dilasa as a strong implementing organization treated almost 5 lakh hectares area of land, which itself is a record.
- Constructed record number of Cement Nalla Bunds (CNB) under CSR and Government schemes in Marathwada region.
- Implemented first aquifer management pilot project in the country.
- Established more than 125 FPOs in Marathwada &

Western Maharashtra and forming 52 more FPOs in Nasik Agriculture Division.

- Established unique Chamber of Farmer Producer Organization for the handholding support of Farmer Producer Organization (FPO).

Lead role of the organization

- Implemented more than **320 village water supply schemes** in Jalswarajya Project of World Bank and Aaple Pani Project of Kfw.
- **Installed drip system** on 5000 hectares of land in Aurangabad district by bridging the gap between the banks and the farmers.

- Only organization which is actively working in **commodity marketing** for the farmers by providing essential food grains to the reputed institutions like ESCON and initiated first shoplet of FPO Baliraja in the APMC Market of Lasur station, which is considered as the major market of food grains.
- Implementing unique project of **System of Rice Intensification (SRI)** in 8 blocks of Sindhudurg district. In addition, organization is implementing biodiversity project in Aurangabad district.

- Implementing **Better Cotton Initiative (BCI) Project** for Ten Thousand farmers, which is a model of intensive agriculture extension for increasing per acre yield, sensitizing about pesticides and fertilizers.
- Implemented first model project of **Rain Water Harvesting** in the state with the help of UNICEF and presently propagating it in a big way.
- Introduced at least dozen new **innovative models of drainage line of the watershed** project. These innovations revived the award from the Central Agriculture Ministry.

Credentials

- The organization received 96% marks in watershed development and sustainable livelihood for the empanelment of the State Level Monitoring Agency.
- Institutional study conducted by NABARD, Pune office –Got 92 % marks
- Life Member of Global Compact Network of India (GCNI) and in Implementing Agency (IA) Hub of Ministry of Corporate Affairs (MoCA)
- National level rating by Department of Land Resources (DoLR) – One of the 8 agencies in Maharashtra – MELD for Integrated Watershed Management Programme (IWMP)
- Project Steering Committee member in Tribal Development Fund projects of NABARD

Infrastructure

- Well equipped building at Vedant Nagar. Spacious area of 6000 sqft with cubicle to the staff.
- Training centre and proposed working women's hostel at prime place of Aurangabad city i.e. Samadhan Colony behind District Court near to Adalat Road, Aurangabad.
- Agricultural land for the proposed agri-processing cluster on WALMI Bajaj Road in Valadgaon premises.
- Laptops - 20 nos., Tab - 6 nos., LCD projectors -2 nos., Air Conditioners - 10 nos., Agro equipments and tools, CCT Cameras, Computer - 28 nos., Laser Printers - 10 nos., Color Laser Printers - 2 nos., Xerox Machine - 2 nos., Digital Cameras - 5 nos., 1 DG set -1 no. UPS System - 1 no., Computer Backup System- 100., Video Conferencing Centre.
- Site equipment - Abney & Dumpy level, Survey Equipments.
- Vehicle arrangements - Vehicle Trackers,

Motorcycles - 12 nos., Jeeps - 3 nos., Ambassador - 1 No., TATA Zest - 1 no., Mahindra Scorpio, Mahindra TUV 300, Tractors -2 nos., water tankers - 1 no., Loading Rickshaw -2, Mahindra Minibus, Refer Van, Ayesher Tempo - 1 no., Dehydration unit - 1 no., Sound System - 3 nos., Refrigerator - 1 nos.,

- Two Telephone facilities, Fax, Broadband Fiber Optic Cable internet connection.

Implemented projects

- Monitoring, Evaluation, Learning & Documentation (MELD)
- CSR Project - ACC Cement
- Girsavali Watershed - Coca Cola India Foundation
- World Bank supported Maharashtra Agriculture Competitiveness Programme (MACP)
- Better Cotton Initiative (BCI) fast track project
- Farmer Producer Organization (FPO) promotion under SFAC
- NABARD supported Producer Organization Promoting Institution (POPI)
- State Resource Organization (SRO) for Integrated Watershed Management Programme (IWMP) - YASHADA, Pune
- Watershed Programme CSR - Multi Commodity Exchange (MCX)
- Financial Inclusion Improves Sanitation and Health (FINISH) Programme
- Backward Region Grant Fund (BRGF) - Capacity Building & Training
- Study on Situation Assessment & mitigating measures regarding farmers' suicides in Marathwada region - NABARD
- Project Implementing Agency (PIA) - Integrated Watershed Management Programme (IWMP)
- Marathwada Drought Relief Project
- Rapid Assessment of Jalyukta Shivar - Monitoring
- NABARD supported WADI (Patur & Igatpuri)
- Watershed Development Fund (WDF) - Aliyabad, Jalkotwadi, Manmodi watersheds
- Mahindra CSR - Shivjal Kranti
- Edelgive CSR
- Centre for Sustainable Livelihood

2

Shivjal Kranti : CSR of Mahindra & Mahindra

The deficit of rainfall and the severe water scarcity made the farmers to undertake their agriculture activities resulting in the poor productivity and the total crop failure last year. The major problem was non availability of drinking water to the villages. People were distressed due to lack of bare minimum water, fodder and gainful employment. As a part of CSR initiative, Mahindra & Mahindra Limited was striving to work with communities and enables them to Rise. Dilasa Janvikas Pratishthan shouldered this responsibility of immediate drought proofing measures, artificial recharge and rejuvenation of existing structures. It is very notable that the total implementation of 50 villages took place in a very short span of seven months. The activities were selected on need based works for water quantity and quality with effective manner. The outreach of Shivjal Kranti is 50 villages with 59 structures covering 67511 beneficiaries.

The project goal was to undertake the sustainable development of natural resources and helping the farmers by making their livelihood sustainable even in the drought situation. The objectives of this ambitious project are to increase the groundwater recharge and improve the existing ecology for the drought proofing. The work was initiated in October 2015 and almost all the activities were completed at the end of March, 2016.

The villages which were constantly facing water scarcity and Dilasa team which made a thorough feasibility study along with the physical verification of the area, reconnaissance survey. In the initial phase

34 villages were selected for the execution. Meetings were conducted with Sarpanch and key opinion leaders to enlighten the villagers regarding the scheme objectives and their roles and responsibilities. The activities are selected based on the work needed for improving the water quantity and also effective measures for water quality. The selected activities were conducting a detailed survey, deciding the priorities of the activities as per MRSAC, obtaining the data of ground water potential. Google earth images are studied in detail before finalization of the structures in the villages. The overall project goals and objectives reflect as thematic area no.6 under Schedule VII of CSR policy i.e. ensuring environmental sustainability.

Preparatory Phase Activities

The major objective of this phase was to implement appropriate mechanisms for adoption of participatory approach to obtain community's acceptance for soil & water conservation measures in their village. During this phase, the main activities carried out were:

i) Baseline information of the village, especially the water budgeting

ii) Selection of sites and beneficiaries, detailed technical survey by the dumpy-staff, Hydro-geological survey of the watershed to map out, Zones of potential groundwater recharge, storage and sustainable groundwater utilization.

iii) Selection of urgent works to be carried out from total list of expected works -as per the location, no. of beneficiaries covered and maximum ground water potential or storage achieved.

iv) For existing structures like cement nalla bund, repair of Kolhapuri Type (KT) Weir, The detailed dimensions of the structures, its discharging capacity are design properly. Before designing the structure details of nalla such as depth, width and other site conditions were studied for the suitability of the structure with respect to specific site condition. The structures are designed from structural stability point of view.

After this exercise, seven activities were selected for the implementation

1) Rain Water Harvesting Storage Tank
2) Village Pond
3) Cement Nalla Bund
4) Bhungroo Technology
5) Repair of Shivkalin Wells
6) Construction of Wall for existing KT Weir
7) Gabion-cum-Wall

1) Rain Water Harvesting Storage Tank

It is permanent water storage structure of ferro cement tank of 10000 liter capacity. The ferro cement tank is like food grain storage or Kanagi. The tanks are fitted with PVC pipe for roof top water collection with filter arrangement. Many villages have given the direct pipeline connection and bore water supply is made. The tank is used throughout the year. The villagers loved this structure because it is most beneficial during the village festivals, marriages to store ample amount of water in it. All

in all 18 villages were covered with 27 tanks construction storing the water of 8,10,000 liters. It is used in a cluster of households of at least 40 families. The tanks have a life of 75 years and are cost effective compared to conventional metal or plastic tanks. During the severe drought situation, incident of women's and children loosing their lives have become a common occurrence. At this juncture, the constructed tanks became when safe as tanker water was also poured in it to avert the clashes. After the rains, the tanks catched the rainfall and it was pleasant surprise for the villagers.

2) Village Pond

Dilasa constructed an innovative structure of village pond in Nillod village of Sillod block. During the technical survey and discussion with the community it was revealed that the nalla was linked with the main nalla and there was the availability of good quality of sand. In the study, it was found that the spot was having maximum recharge. After this confirmation nalla was excavated and widen to obtain a necessary slope to flush the water into the pond. This pond has created direct recharge to the wells which were usually used for drinking and irrigation purpose. Due to the increase in the ground water levels in the wells, farmers can save the crop by irrigation in the drought situation too. The was stored in this pond is 11,88,000 liters.

3) Cement Nalla Bund

Dilasa constructed a dozen cement nalla bunds in 12 villages apart from repairs of cement nalla bund structures at two places. The cement nalla bund structures are constructed across the nalla's or river which benefited the wells and dug wells around it.

This is a permanent masonry structure with life span of 75 years. Moreover, these structures are maintenance free and require only desiltation after the period of 3 years. The structures allow natural ground water recharge as well as create the pressure of water in nalla to recharge the nearby wells. Cement Nalla Bund is the structure which gives the tangible benefits. In the villages like Khamgaon and Ambhai existing cement nalla bunds are repaired by plastering, construction of wing walls to protect the banks and constructed of water cushion. This is how the common assets in the villages were reutilized.

4) Bhungroo Technology

Bhungroo is an innovative technology of storing water in between the rocky strata and utilize the water during the scarcity. Bhungroo means straw sucking of water. In hard rock area it is necessary because natural percolation is very limited so this technology is useful in the storing of the water in the large scale. Village Khamgaon is severely drought-affected village. The geographical area is more than 2,500 ha and population is around 3,000. The village is surrounded by hills. Most of the rain water gets washed out without recharging any part of the area. The strata in the village are hard rock and murum where ground water recharge is minimum. Dilasa introduced first time globally-recognized disaster mitigating technology called Bhungroo in Khamgaon village. Under this technology, rainwater from the catchment area gets stored underground for usage in lean periods. As per the calculations in Khamgaon village, the total catchment area is around 2 kms. with a nalla width of around 10 m. As per the discussion with the farmers in Khamgaon village, the water would be utilized for drinking purpose not just by one farmer but by nearby area and vasti. Bhungroo can work with just an annual rainfall of 400 mm. The depth of Bhungroo in village Khamgaon is 266m.

5) Repair of Shivkalin Wells

This is a small intervention with a big impact. In Aurangabad district there are many old Shivkalin wells which are effective for the water storages even today. Small repairs and desiltation of drinking water supply wells, rejuvenate the whole water system. This was the most effective measure for drought proofing as the drinking water supply well was providing water to all the villagers. This simple but effective measure was undertaken in 5 villages benefitting more than 12,000 beneficiaries. In Chauka village the urgent works were taken apart from the repair of the pulleys for withdrawal of water and total cleanliness. After the effective implementation, everyone liked the dead gone structure into the useful asset.

6) Construction of Wall for existing KT Weir

With earlier experience of the construction of wall in old KT weir construction, Dilasa had undertaken the KT repairs in 3 villages by storing the water more than 101.4 million liters. It is observed that most of the gates in the KT weir are corroded or bushes are not in working condition. This had resulted into the non storage of water in the KT weir. In Deogaon Rangari, Ye Ye Ganga River flows for the period of 4-5 months after the good rainfall. But no water was stored. Because of the construction of wall in between the columns of the KT weir, about 1.1 meter height of water was stored along with the back water length of 1 km. The total length of constructed wall is 24 meters recharging almost all the wells in big sized Deogaon Rangari village.

7) Gabion-cum-Wall

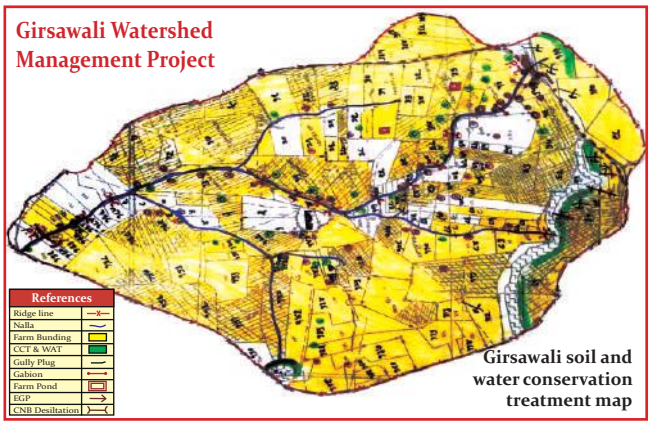
Under the CSR work, Dilasa constructed 4 gabion cum walls, which is an innovative structure. Gabion is basically soil erosion control measure. It is the structure where big stones are bounded in wire mesh. Dilasa team has made innovative structure by transforming the gabion into gabion cum wall. Gabion cum wall is suitable at the locations where cement nalla bund structure is not possible and where nalla banks are not of same height and not stable. Gabion cum wall serves the purpose of water storage and allows excess water to overflow the structure. As this is erosion control structure, good quality of soil gets deposited in the structure, which is again beneficial for the nearby farmers. This is low cost but effective water storage structure supported by Mahindra & Mahindra.

3

Girsavali Watershed : CSR of Coca Cola India Foundation

Girsawali watershed area is situated at a distance of 10 km from Phulambri block of Aurangabad district head quarter and 40 km from Aurangabad city in the state of Maharashtra (India) . The total area covered under this watershed project is 400.66 ha. The average annual rainfall in this watershed is only 535 mm while the soil is of silty loam and silty clay type. Consequently the entire agriculture is rainfed with very less agriculture production. The Girsawali village is facing severe drought, hailstrom and eratic raifall since 2014-15. Girsawali is in drought prone area of Phulambri block of Aurangabad district and the agriculture is entirely dependent on monsoon.

Looking the situation of area and conditions of villagers, Dilasa has started the implementation of the drought-proofing activities with systematic study of hydrogeology and GIS mapping technology from April 2013 with support of Anandana Foundation, Delhi. The main objective of this soil and water conservation activities is to create sustainable livelihood opportunities through natural resource management. As a result of these series of activities initiated, the livelihood of the villagers are enhanced and there is reduction in migration, Kharif crops yields better in village Girsawali as compared to adjoining non-watershed villages. The activities are implemented by keeping very less expected rainfall and within such circumstances the villagers should be able to get at least moderate agricultural production.



Girsawali soil and water conservation treatment map

The Divisional Commissioner Dr. Umakant Dangat had praised the work sponsored by Coca Cola India Foundation for its innovative nature and its large scale effect on the watershed community. He also appreciated the concept of concrete lining on farm pond instead of using the conventional plastic sheets to overcome the problems related to wear and tear of the plastic sheets. During the year 2013 to 2015, Girsawali watershed works are almost completed. Because of the water storage, it is seen commonly in almost every field that good amount of moisture available. Because of moisture availability in the farm the farm produce is with ample quantity can before watershed. e.g. production of jawar was just 2 quintal per ha. before watershed works but now in the same field the production is 10 quintal per ha. Similarly, the cotton production is almost 25 quintal per ha. as compared to the nearby village where the watershed works are not carried out which is just 7 quintal per ha.

Another impressive impact of Girsawali is that the concurrent drought situation from last 4 years the villagers are not migrating and this year they are surviving for drinking water without any tanker in the village. Systematic implementation of watershed proved as the only medicine for the drought-proofing as Girsawali is the green island situated in the drought of the Marathwada.

Apart from the farm bunding, stone outlet, small earthen gully plugs, gully plugs, Water Absorption Trench (WAT), Continous Contour Trench (CCT), Gabion Structures, the farm pond with concrete lining became the point of attraction in the Phulambri block.

Innovative farm pond with concrete lining

Water storage structure is beneficial for protective irrigation. In case of erratic rainfall, the stored water will be utilized by the farmers for irrigation, animal water requirement, etc. Two water storage structures are built in Girsavali each having capacity of 675000 litre. These structures will be helpful for the farmers during electricity shutdown period which is almost 12 hours in the villages. Under such situation farmer can lift the water from the dug well and store it in the storage structure so that he can provide irrigation by gravity.

Apart from routine farm pond structure in which plastic lining is done, however the response of the farmers for such plastic lining is not very encouraging. Because the life of plastic lining is limited upto 2 to 3 years and again putting such lining is very difficult for the farmers.

Dilasa team specifically made interventions of concrete-lined farm pond which is permanent storage and excess water can go through the pipe opening into the nalla. Proper care is taken for safety of animals and children by constructing compound wall along the farm pond. To reduce the evaporation losses, green shednet cloth is used which can be again reusable by the farmers. With this type of farm pond, the farmers are able to save their pomegranates fruits and other crops like maize, bajra etc. The total water conservation in Girsawali shows that huge potential is created before rainy season and if only 10% will contribute as recharge then the village can survive peacefully with sufficient income.

Water Conserved in Girsawali

Sr. No.	Type of Structure	Water capacity of Structure (litre)
1	CCT under afforestration	3094200
2	Water absorption Trench (WAT)	1375200
3	Farm Bunding	42890080
4	Earthen Gully Plug	100000
5	Water Storage Structure	1350000
	Total	**4,88,09,480**

Livelihood Activities

Considering the changes in precipitation pattern with respect to timing and quantity, there are more chances of crop failure and decrease in the crop production. It impacts mostly livelihoods of small and marginal farmers.

Dilasa has implemented these livelihood activities in a very systematic and participatory manner. Initially, a poultry shed from Sahyadri Industries Ltd. has been introduced in the village with the interested families. A resource person from Sahyadri Industries conducted meeting along with Dilasa Team in village Girsawali and narrated the complete costing of this activity of 120 poultry birds.

4

Revival of Kambli river : CSR with ACC Cement

Some of the largest corporate entities in Maharashtra sat in a meeting called by the Hon'ble Chief Minister of Maharashtra to explore how the private sector could assist state agencies in combating the persistent drought in parts of the state. The official presentation gave a grim picture of the situation on the ground. There were pockets of severe water distress spread across the state, resultantly the livelihood options were running out for a large section of the population. It was an emergency.

Official presentation over, the Hon'ble Chief Minister invited the business houses present to suggest how they could help. In response, ACC requested the government to allot villages where it could roll out a programme towards drought resilience. The experience and expertise garnered through water conservation projects for host communities across plant sites gave ACC the

confidence for direct action on the ground. Hivra and Pimparkhed villages in Ashti tehsil, Beed district, with a total population of 3800, were assigned to ACC for drought proofing.

As a first step, ACC cement selected Dilasa Janvikas Pratishthan as an NGO for its best technical and implementation expertise to assess, design and roll out a drought proofing programme in the target villages.

The Beed district was facing the drought situation since last 4 years and all the villages in an around Kambli river were affected in a big way. Dilasa Janvikas Pratishthan had made the extensive survey of the aquifer of Kambli river along the villages like Hivara, Pimparkhed, Welturi and Bhojewadi villages. The herculean task of reviving the Kambli river was undertaken by the ACC cement. In all these villages 21 Rain Water Harvesting Structures were constructed. In Hivara village 4 cement nalla bunds were completed and 2 Cement nalla bunds were constructed along the bank side of Pimparkhed village apart from the repair of KT weir. The economy of the village is mainly based on the agriculture and milk production. There is a visible change in all the villages after the revival of the Kambli river.

The water conservation measures which have been carried out are full of water this year. The people

revealed the revival of Kambli river by getting the sustainable solution for drinking water problem, increase in irrigated area, raise ground water level, change in cropping pattern, improve agriculture productivity for the farmers. It was very painful that the rains continue to be scanty in all these villages for four years. However, the villagers are very happy with the adequate rainfall in the area.

5
Storage Structures : CSR of EdelGive Foundation

EdelGive Foundation is the philanthropic arm of the Edeliweiss Group and was established in 2008. Since our inception, we have worked towards being a bridge between the users and providers of philanthropic capital and knowledge by bringing the skills, resources and talents of the for- profit world to the not- for- profit arena. Dilasa Janvikas Pratishthan associated with EdelGive Foundation on the backdrop of severe drought in Osmanabad district. As a part of an urgent drought proofing, the foundation sanctioned the water storage structures in Jalkotwadi, Manmodi and Aliyabad villages. Dilasa team had completed all the structures in record time and the people are reaping its benefits.

Because of completion of water storage structures, the water harvesting with the minimum rainfall has begun in the field. This has resulted in the protective irrigation for the vegetables grown in the area. Because of non availability of water storage in the nalla, the farmers were unable to protect their vegetables previously. Because of water storages in the nalla, the rabi season crops as well as the grape production on drip will be enhanced. Because of the non availability of water the villagers were previously unable to grow any rabi crops and don't have any livelihood. Due to this construction activity villagers are getting the wages for daily work which will positively impact their livelihood.

By adopting the strategy for water storage structures in Aliyabad village, it has strengthened the natural resources such as land, water, plants for the betterment of human beings and livestock in above villages. The villagers have eagerly awaited the water storage structures in their area so that they will have at least agriculture activities for their survival otherwise they have to migrate in search of works now. Around 684 households will get benefited by completing the water storage structures; there will be more number of indirect beneficiaries.

It has also lead to improved existing ecology for drought proofing and created sustainable livelihood opportunities. Due to the complete watershed treatment through this water storage structures, raised income of the families have enhanced the quality of life in health, education, nutrition etc.

6

Climate Proofing Project : CSR with MCX and NABARD

This is the unique project of climate proofing in which watershed is the base while all the factors related to the climate change adaptation are considered. The Multi Commodity Exchange of India Limited (MCX), India's first listed exchange, is a state-of-the-art, commodity futures exchange that facilitates online trading, and clearing and settlement of commodity futures transactions, thereby providing a platform for risk management. Incidentally, Dilasa Janvikas Pratishthan was selected as one of the organization for the project of MCX after the brainstorming meeting in NABARD regional office. It is a joint venture of NABARD and MCX in which MCX is contributing 50% amount while 50% amount will be shared from Watershed Development Fund of NABARD. MCX & NABARD selected the most critical watershed of Ghotka in Nanded district. This is three years project. However, Dilasa completed the capacity building phase instantly and entered into Full Implementation Phase (FIP).

Ghotka Watershed is located at a distance of 14 km from Loha situated in Nanded District. The watershed is located on the boundary line of Nanded and Latur District. Socially the Ghotka is dominated by Buddhist and Maratha Communities.

The total area of Ghotka watershed is 1756.44 Ha. Out of which total treatable area is 1494.23 Ha. and total CBP area is 144.50 ha.

The Ghotka watershed characterized by seasonally erratic rainfall, low agricultural productivity, degraded natural resources and low economic status. According to the social survey conducted the total population of Ghotka is 1799 covering 327 families. Average land holding per household is around 5 ha. area drains from south to north towords Limboli River. The average annual rainfall is 530 mm. Major cropping pattern is Bajara, Jawar, Maize, Soyabean in Kharif season followed by Wheat, Jowar, Onion, Maize in Rabi season and fodder.

With the analysis of all situation and degraded natural resources, Dilasa team identified Ghotka watershed unit for technical efforts to conserve soil and maximized the utilization of surface and subsurface water for crop production. The afforestration area proposed for the treatment is 20.70 ha. The major treatment is area treatment of farm bunding covering 123.80 ha.

Dilasa has created awareness among the community about importance of watershed development as entry point activity. Dilasa has organized series of meetings and trainings in the area. The purpose is to sensitize the villagers towards execution of watershed works through formation village level watershed committee (VWC). Accordingly, Dilasa has formed one VWC and arranged their exposure visit to successfully completed Aliyabad watershed project.

7

Defecation free villages : an initiative with FINISH Society

FINISH society was registered in 2010 as a multistate not for profit organization under Societies Registration Act 1860 to help implementing the project and to strengthen the initiative linking it to better hygiene, environment, enterprise development and waste management. FINISH Strategy is to follow a holistic approach by integrating behaviour change with sanitation, hygiene & waste management through increased awareness, supply chain interventions and financial inclusion leading to improvement in quality of life.

With the extensive experience of Dilasa in the field of water & sanitation, the FINISH society entrusted the project of 17 villages of Phulambri and Kannad blocks of Aurangabad district. The initial awareness is the base of the sanitation. As the children are the most effective change agents, the activity was initiated from the school by taking out the morning processions by displaying the posters of the importance of the defecation free village. In sequence, many activities like portraying the walls, distributing effective messages through pamphlets, rangoli competition and corner meetings of various groups including Self Help Groups were organized. In addition, special training programmes were organized to change the mindset from the set mind of the people.

Dilasa carved out defecation free village Javkheda Bk. in Kannad block. It is very pertinent to note that all the families are utilizing the latrines every day and no person is isolated from it. The Mahila Sarpanch, Mrs. Savita Sahebrao Matere of the village came forward and gave the ignition to every family to start the construction of the latrines. It all started on 26th January when the gramsabha approved the resolution of defecation free village. About 358 personal latrines were constructed and there was a competition between different wasti's for the construction of safety tank and the soakpits for the latrines. The Zilla Parishad gave Rs.12000/- as a grant to every family and rest of the amount was contributed by the people themselves. In the mode of the construction, many workers including masons received the employment and achieved the skill by constructing record number of latrines within two months time.

8

Drought Relief Project: CSR of Caring Friends

Caring Friends (CF) Mumbai, is an informal group of friends, who have come together to act as a bridge between outstanding NGOs and donors. We do the due diligence – visit, assess and assist the NGOs – so that every rupee that the donor contributes is used optimally. Our only criteria to support an NGO is the excellence of work and factors like caste, creed, religion, region or gender do not matter. As of today CF is associated with more than 30 NGO in 10 states of India, they work on various issues like the welfare of children, women, farmers, physically challenged, tribal, animals and also NGOs working on Govt. reforms.

After the meeting of Ambejogai under the Chairmanship of Dr.Umakant Dangat, the Divisional Commissioner, the Mumbai based Caring Friends came forward for the relief measures. The Osmanabad Collector, Mr.Narnavare submitted the report about the strategy as to how NGOs can be included in the mainstream of NREGA

scheme. It was decided that Sanskruti Samvardhan Mandal, Sagroli will work as the divisional coordinating agency. Dilasa Janvikas Pratishthan as a lead organization participated in the drought relief project. Dilasa assigned ten NGOs for the working of MREGS in Aurangabad district. Every organization selected ten villages for the MREGS scheme. The major objective before the NGOs was to create the amicable atmosphere for the employment guarantee scheme and bridge the gap between the Government Officials and Gram Panchayat at village level. It is notable that every NGO created the work output with the help of average 5000 people.

The MREGS works of Dilasa remained noteworthy in Naigaon and 9 villages of Phulambri block. With the severity of the drought, more than 150 people marched every day on the field for digging the farm bunds activity. In short span of time they have created the work output of Rs.5 lakh. Moreover, the people have received the confidence about the MREGS scheme and the wrong notions of getting the payment very late, problems in the measurement and recording were completely wiped-out. Caring Friends came forward to give the seeds of Tur dal to every family and the farmers are reaping the benefits of those seeds in the coming season. The seeds were distributed free of cost to every labour who was toiling hard on the field. In addition, the loan of Rs.2500/- is given to hundred beneficiaries on the eve of rabi season. and they will return the amount without interest after the harvesting rabi season. In a similar way, the loan was given for the rabi season to the hundred beneficiaries in Chincholi Naquib village.

9

Farmer's Suicide: Study on "Situation Assessment"

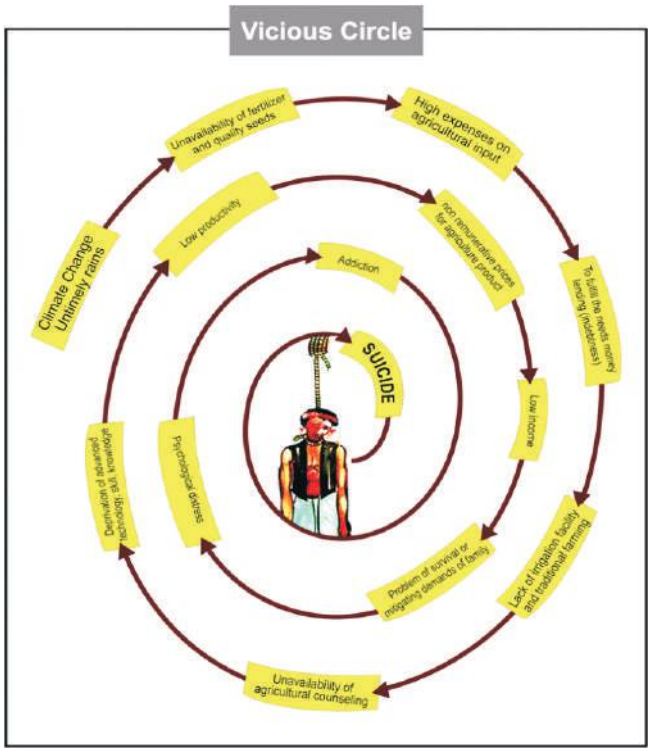
NABARD's Department of Economic Analysis and Research (DEAR) appointed Dilasa Janvikas Pratishthan to conduct a detailed study into the "Situation assessment & mitigating measures regarding farmers' suicides in Marathwada Region". The objective of the study was to assess and validate the root causes of the large number of farmer suicides in Marathwada and suggest remedial measures/ interventions to avoid the suicidal cases in future. The findings from the study would be used to: 1) Suggest agrarian policies and interventions to improve the situation of agriculture particularly in Marathwada and for similar drought prone area, in general; and 2) Suggest localized coping strategies for farmers to tackle the agrarian crisis based on their local geographic conditions.

The methodology of the study included interviews with relatives of suicide victim households, case assessment, focused group discussions, statistical analysis (descriptive statistics like sum, mean, frequencies and percentages as well as advanced statistics such as logistic regression and Spearman's rank correlation). To compare and contrast the condition of suicide victim households, a sample of non-suicide farmers was also interviewed.

The key inference that emerged from the study is that a chain of distress events have led to farmer suicides, which can be termed as the "domino effect of agrarian distress". Climate change & traditional cultivation practices have triggered this chain of events - low crop yield which further led to low crop income per acre, then the inability to repay loans, further taking new loans to meet household expenditure needs and finally, the inability to cope with debt burden and income loss resulting in the farmer committing suicide. The study found certain psycho-sociological factors i.e. symptoms related to depression which includes helplessness, hopelessness, guilty consciousness, restlessness, etc. in the victims that caused the inability to cope with debt burden and income loss, which finally led to the suicide.

Climate change as a trigger event has been stated by a majority of the suicide victim households. When the respondents were asked about which natural calamities were responsible for their agricultural woes, 82% responded 'yes' to drought and 79% of them also stated 'yes' to hailstorms in the year 2014. A significant 63% of households where farmer suicides occurred have declared total crop failure. This has also been substantiated by a graphical correlation between monthly unseasonal rainfall (excessive/deficit) and the occurrence of suicides in the year 2014. The months where excessive or deficit rain has occurred have seen an uptick in suicides across all districts of Marathwada.

Faulty and costly agricultural practices as a trigger event emerges from the fact that many victim households have declared increased cost of cultivation, low crop yield and therefore, low crop net income as distress factors. 64% of households where suicides have occurred stated increased cost of cultivation as one of the main distress factors facing them. 48% also added that lack of remunerative prices for agricultural produce was also responsible for their agrarian woes and 50% mentioned lowering agricultural productivity. Suicide victim-households received a net income of



only about Rs.2000 per acre of soybean and Rs.1000 per acre of cotton. Moreover, farmers declared a crop yield of merely 3.5 quintals per acre for soybean and 4.2 quintals per acre for cotton, both which are below the state and national averages Unscientific agricultural practices also emerged as the cause for excessive alkalinity of soils from the case of farmers residing in the well-irrigated Godavari basin.

The inability to repay loans is evident from the huge loans outstanding in victim households. When victim households were asked to recall their active loans outstanding with various sources over the past three years, it was found that 72% households had at least one loan outstanding. The average loan amount outstanding was highest with private informal moneylenders at about Rs.1 lakh per household. Taking new loans to meet household expenditure needs is also evident from the finding that repayment of loans accounts for 45% of a victim household's expenditure.

When asked about distress factors, 50% households mentioned debt notices and follow-ups while 41% mentioned moneylender debt. Even most of the case studies indicated huge indebtedness of farmers, with their assets being repossessed by banks or moneylenders harassing them. Moreover, many households stated the farmers were even more distressed because of impending major expenditures especially getting their daughters married. This was a reason stated in many of the cases.

The inability to cope with debt burden and low income from agriculture is visible from the anxiety and depression indicators that were visible in the suicide victim before his death. About 44% respondents noticed discomfort and 54% noticed depression and despair in the victim before his death. Addiction to drinking and smoking were also observed in about 30% of the victims. Some of the case studies reinforced this fact by narrating the farmer's addiction to alcohol before his death. The ways in which suicide was committed also shows a certain psychological inability to cope with the distressed situation – 48% committed suicide by hanging and 41% by taking poison. The logistic regression analysis also shows certain anxiety and depression factors as statistically significant -- farmers who have a tense relationship with family members, have a sense of guilt, experience suicidal

thoughts, experienced lack of affection, show isolated behavior, express a feeling of hopelessness, express the lack of emotional support, express the lack of hope in future, show signs of addiction to drinking and show signs of acute anxiety, seem to have a higher probability of committing suicide.

This situation contrasts with the way the situation was coped with by non-suicidal farmers. 82% of these farmers said that the advice from their wives and relatives helped them tackle their problems more effectively. This indicates the importance of a strong support system in helping farmers cope with distress situations. Around 42% farmers also mentioned resorting to bhajans as a coping mechanism.

The report recommends that every event in the chain of events causing the “domino effect of agrarian distress” needs to be tackled separately. This will ensure an integrated approach towards agrarian distress.

Dr. Anagha Patil, the President of Dilasa Janvikas Pratishthan worked as Chief Investigator in this precious study.

10

Backward Region Grant Fund (BRGF): CB & Training Evaluation

Yashwantrao Chavan Academy of Development Administration (YASHADA) is the apex Administrative Training Institute of the Government of Maharashtra, and meets the training needs of government departments, rural and urban non-officials and others stakeholders. Yashada intends to carry out evaluation study to have an understanding about the effectiveness of the capacity building of elected representatives and functionaries of local self-government under BRGF scheme. Apart from training and capacity building programs in State Institute of Rural Development which is located in Yashada, Pune, there are Gramsevak Training Centers, Panchayat Training Centers and Extension Training Centres in Maharashtra and to conduct training of elected representatives and, panchayat raj functionaries and officials certain institutions / NGOs have also been identified to work under the close supervision of District Rural Development Agencies. All these Centers & Training Agencies are also involved in imparting training. Objectives of evaluation are:

- To study impact of Capacity Building (CB) and Training of PRI Elected representatives and functionaries in Maharashtra.
- To carry out the evaluation of the Capacity Building and Training Programmes conducted by the SPAs (Service Providing Agencies –NGO/ Training Institutions).
- To carry out evaluation of capacity building and training conducted SIRD Yashada.

Major objectives of Training & Capacity Building

1. Enabling Panchayat elected representatives to upgrade their knowledge and skills to better perform their responsibilities, such as implementing programmes equitably, enabling them to think in terms of concrete actions they can take or facilitating and equipping them with the skills required for day-to-day performance of executive duties;
2. Orienting key officials associated with the devolved functions to

(i) better function as technical advisors and trainers

(ii) respect, be more receptive and learn from the ground level experience of elected Panchayat representatives;

3. Improving the Gram Sabha functioning, particularly for the poor, to assess their demands through participative planning, monitor plan implementation and to hold their Panchayat accountable through invoking Right to Information and social audit.

Description of actual services provided by your staff within the assignment

- Conducting meeting with DRDA officials and social mobilisers and briefing them with evaluation purposes and process involved. The total evaluation sample size in all for different stakeholders is 37666.
- Mapping of the villages in each district for selection of villages in an unbiased manner
- Meeting with NGO staff for secondary data collection in terms of year-wise attendance of trainees during training, names of trainers
- Collection of secondary data collection from DRDA officials and NGO staff
- Primary data collection from village level from GP members, GP officials, ZP members, ZP officials, NP members, NP officials, MNP members and MNP officials
- Submission of timely reports to the client on monthly basis
- Planned and designed all trainings of field staff and field coordinators

11
FPO Movement : Dilasa's Participation

Dilasa Janvikas Pratishthan has been entrusted by the government to promote Farmer Producer Organizations (FPOs) in Maharashtra in order to help improve the productivity, profitability and market access of farmers by aggregating them into farmer producer organizations.

At present, Dilasa is facilitating the aggregation of more than 40,000 farmers into 126 Farmer Producer Organizations (FPOs) under the aegis of the World Bank funded Maharashtra Agricultural Competitiveness Project (MACP), NABARD financed Producer Organization Promotion (POPI) and the Small Farmers Agriculture Business Consortium (SFAC).

As a supporter and promoter of FPOs, Dilasa stood by the FPOs right from inception to the point of their reaching a mature stage of business. Dilasa is present at the ground level creating awareness about the benefits of FPOs, mobilizing farmers into groups, building their capacity to work as an "organization", helping farmers prepare their documentation, registering the FPOs as Producer Companies and helping them build robust business plans. Thereafter, Dilasa will help these FPOs bring their business plans to reality through forward and backward market linkages, agricultural extension services, and certification of crop for better marketability, facilitating trading services on NCDEX platform etc.

Dilasa's Journey with FPOs in Maharashtra

Dilasa's journey with FPOs started in 2012 with our very own flagship FPO called Dilasa Baliraja Krishi Utpadak Producer Company Ltd (DBKUPCL), which was catered for farmers in Aurangabad district, where Dilasa has its headquarters. Further details about DBKUPCL and its key activities are mentioned in the Annexure 2. Dilasa has also been mandated to form 125 Farmer Producer Organizations (FPOs) under the aegis of the following projects. All the FPOs are at various stages of formation.

1) World Bank supported Maharashtra Agricultural Competitiveness Project (MACP)

1) World Bank-supported Maharashtra Agricultural Competitiveness Project (MACP)

The Project Development Objective of the Maharashtra Agricultural Competitiveness Project (MACP) is to increase the Productivity, Profitability and Market Access of the farming community in Maharashtra. This would be achieved by providing farmers with technical knowledge, market intelligence and market networks to support diversification and intensification of agriculture production aimed at responding to market demand. Farmers will also be assisted in establishing farmer organizations, developing alternative market channels outside the purview of the regulated markets and in supporting the modernization of promising traditional wholesale markets.

The project has three main components:

- Intensification and diversification of market led production
- Improving Farmer access to Markets
- Project Management, Learning & Adjusting

Implementation of the three components will take place across all districts in the State rolled out in three overlapping phases covering ten, eleven and twelve districts, respectively. About four million farmers are expected to directly or indirectly benefit from the Project.

MACP has hired the services of Dilasa Janvikas Pratishthan for the Formation of Common Interest Groups (CIGs) / Farmer Interest Groups (FIGs) / Producer Groups (PGs) in the districts of Maharashtra viz. Latur, Nanded, Beed, Osmanabad and Solapur districts. The overall objective of this assignment is to develop, establish viable & sustainable CIGs / FIGs /PGs in project area to undertake various activities such as group based agricultural extension and to work as a member of Producers Association (PA) for bulk purchase of inputs and delivery to individual members; marketing of produce, grading, primary processing and linkages with markets.

MACP has also authorized Dilasa for the establishment of Producer Companies& FCSCs (Grains) and FCSCs (Fruits & Vegetables) for the project in Latur, Beed, Nanded and Osmanabad districts of Marathwada as well as Satara, Sangli and Kolhapur.

2) Dilasa as a Producer Organization Promoting Institution (POPI)

NABARD has undertaken the project to promote and nurture Farmer Producer Organizations (FPOs) under the Producers Origination Development & Upliftment Corpus" (PRODUCE) given in the Union Budget 2014-15 in order to achieve:

- Ultimate Objectives are better price discovery and better income enhancement opportunities for farmers
- Rationale: Aggregation is an important facility for small & marginal farmers for realising economies of scale, accessing the market and for reducing transaction costs.

The farmer producer organizations (FPO) will be

formed by a group of primary producers and will be a registered body and a legal entity. The producers will become, primarily shareholders in the organization. The FPO will deal with business activities of primary produce / product / inputs and is meant for the benefit of the member producers such that portions of profit are shared amongst the producers & the balance goes to the share capital or reserves. The minimum shareholding members should be at least 50 at the time of registration and the shareholding membership to be increased over a period of 3 years to a sustainable level.

The project will be undertaken in Watershed and Wadi projects in Maharashtra to further leverage the development of farmers in these project locations.

The promotion of FPOs in these project locations will be taken up with the involvement of producer organization promoting institutions (POPIs), involvement of Resource Support Agencies (RSAs), close involvement of stakeholders (NGOs, Banks, Line Depts. of Govt.), meetings with stakeholders / round table conferences and development of best practices and success stories for replication.

Dilasa Janvikas Pratishthan has been selected as a producer organization promoting Institution (POPI) to implement this project in multiple watershed and wadi locations in the districts of Aurangabad, Jalna, Nashik and Akola.

3) Small Farmers Agribusiness Consortium (SFAC)

Small Farmers' Agribusiness Consortium (SFAC), a Society promoted by the Department of Agriculture and Cooperation, Ministry of Agriculture, Government of India, has been mandated to act as a nodal agency to promote FPOs during the XII Plan. SFAC is to coordinate with various State governments, civil society partners, private sector, financial institutions, resource persons and other stakeholders to help in the conduct of baseline studies, promote Farmer Producer Organizations (FPOs) across the country and link producer groups (both existing ones and newly formed institutions) to marketing opportunities.

Small Farmers' Agribusiness Consortium (SFAC) has identified Dilasa Janvikas Pratishthan (DJP) as a Resource Institution for the work of promotion of Farmer Producer Organizations (FPOs) under Vegetable Initiative for Urban Clusters (VIUC). DJP will mobilize 5,000 farmers and 5 FPOs under this project in Marathwada region of Maharashtra state.

In all the three projects, Dilasa's key role is to handhold the FPOs from inception to maturity:

- Create awareness amongst farmers in the designated locations about FPOs and their benefits, influencing key decision makers and leaders.
- Enrolling interested farmers into groups(15-20 members)
- Help them open bank accounts to start saving up towards the paid-up share capital
- Capacity building of farmers on FPO dynamics: How to work as a democratic independent organization – conducting monthly meetings, appointing leaders and managers, maintaining record books, accounts etc.
- Training on good cultivation practices

- Training on incorporation as a producer company.
- Collect documents required for incorporation and Registration of the producer company with Registrar of Companies
- Create awareness of what farming gaps need to be addressed through FPOs and how? – prioritizing needs, planning next steps
- Helping the producer company prepare a

professional business proposal to apply for grants/loans / subsidies to cover initial capital cost, working capital expenses, equity/paid up capital etc. Participatory planning of FPO activities capital costs, expected revenue and expenses, projecting cash flows, deciding cost heads etc.

- Assisting and facilitating producer companies in overall management imparting training, facilitating and execution of Business plans
- Handhold the PC in implementation of its business plan – market linkage, plant and machinery purchase, certification of produce for better marketability; Support them in Sourcing Funds and Achieving their Plan.

Certification of crop produce for better marketability

Dilasa is also building the capacity of FPOs to comply with international standards in agriculture. In recent times, many procedures and standards have been drafted to make agriculture a more sustainable livelihood. Not only, sustainability, but complying with these standards, also makes agricultural produce more marketable in global as well as urban Indian markets. Some of these standards and certifications have been listed below:

The Better Cotton Initiative (BCI)

BCI advocates the Better Cotton Standard System as a holistic approach to sustainable cotton production which covers all three pillars of sustainability: environmental, social and economical. Each of the elements–from the Production Principles and Criteria to the monitoring mechanisms which show Results and Impact – work together to support the Better Cotton Standard System, and the credibility of Better Cotton and BCI. The system is designed to ensure the exchange of good practices, and to encourage the scaling up of collective action to establish Better Cotton as a sustainable mainstream commodity. Dilasa is already working with about 7000 cotton farmers to help them comply with BCI standards.

Roundtable for Responsible Soy (STRS)

RTRS has created the RTRS Standard for Responsible Soy Production which is applicable on a worldwide level to assure soy production that is socially equitable, economically feasible and environ-mentally sound. Dilasa is working in close collaboration with Solidaridad India to enable RTRS certification for soybean farmers in Marathwada.

Fairtrade India

The Fairtrade movement has a long history in India. In the start Indian producers worked with Fairtrade to access international markets on better terms of trade. Fairtrade India aims to build on the success of the export market in key products, including coffee, tea, rice, spices and cotton, and directly reach the growing ethical consumer market here in India. A product that carries the Fairtrade Certification Mark has met the rigorous Fairtrade Standards, which focus on improving labour and living conditions for farming communities and promoting a way of farming that protects people and the environment.

Global GAP

G.A.P. stands for Good Agricultural Practice – and GLOBAL G.A.P. is a worldwide standard that assures good practices for agriculture. Global GAP connects farmers and brand owners globally in the production and marketing of safe food to provide reassurance for consumers. They lay the foundation for the protection of scarce resources by the implementation

of Good Agricultural Practices with a promise for a sustainable future. GLOBALG.A.P. offers the farmers one core product: GLOBALG.A.P. Certification, available for 3 scopes of production: Crops, Livestock, Aquaculture consisting of a total of 16 standards.

NPOP

The National Programme for Organic Production (hereinafter referred to as 'NPOP') provides for Standards for organic production, systems, criteria and procedure for accreditation of Certification Bodies, the National (India Organic) Logo and the regulations governing its use. The standards and procedures have been formulated in harmony with other International Standards regulating import and export of organic products.

NOP

The National Organic Program (NOP) is a regulatory program housed within the USDA Agricultural Marketing Service. We are responsible for developing national standards for organically-produced agricultural products. These standards assure consumers that products with the USDA organic seal meet consistent, uniform standards. Our regulations do not address food safety or nutrition.

Brief Profile of the FPOs & Geographic Coverage

District	Number of FPOs*	Key Crops
Latur	15	Soybean, Sorghum, Pulses, Mango, Pomegranate, Chilli, Tomato, potato, other vegetables
Osmanabad	16	Soybean, Pulses, Sorghum, Potato, Onion, Cereals
Beed	15	Pearl Millet, Cotton, Soybean, Pulses, Sorghum, Mango, Grapes, Mosambi, Onion, Custard Apple, other F&V
Nanded	15	Cotton, Sorghum, Soybean, Pulses, Banana, Mosambi, Mango, Tomato, Brinjal, Okra, other F&V
Satara	14	Pearl millet, Groundnut, Sorghum, Wheat, Maize, Paddy, Soybean, Tomato, Okra, Ginger, Pomegranate, Onion, Potato, Turmeric, Strawberry, Mango, Grapes, Banana
Sangli	14	Soybean, Groundnut, Maize, Chilli, Okra, Paddy, Sorghum, Pearl Millet, Pomegranate, Grapes
Kolhapur	14	Soybean, Paddy, Ragi (Finger Millet), Groundnut, Cauliflower, Tomato, Brinjal, Okra, Chilli, Cashewnut , Mango
Aurangabad	17	Maize, Cotton, Jowar, Bajra, Pomegranate, Sweet Lime
Jalna	04	Maize, Cotton, Jowar, Bajra, Pomegranate, Sweet Lime
Nasik	01	Vegetables
Akola	01	Soybean
Total	**126**	

* Each FPO has 300-400 farmer members

Summary FPOs Crop Profile

115 Farmer Producer Organization (FPO) till September 2016

Sr.	Name of FPO	District	Programme
1	Navbharat Shetkari Producer Company Limited	Beed	FCSC - MACP
2	Krushi Bhushan Agro Producer Company Limited	Beed	FCSC - MACP
3	Samruddhi Krushi Anand Producer Company Limited	Beed	FCSC - MACP
4	Nagad Narayan Farmer Producer Company Limited	Beed	FCSC - MACP
5	Creative Shetkari Producer Company Limited	Beed	FCSC - MACP
6	Balaghat Agro Producer Company Limited	Beed	FCSC - MACP
7	Macchindranath Kisan Producer Company Limited	Beed	FCSC - MACP
8	Agro Unnati Farmer Producer Company Limited	Beed	FCSC - MACP
9	Chinchala Agro Producer Company Limited	Beed	FCSC - MACP
10	Radha Krishna Harki Nimgaon Agro Producer Co.Ltd.	Beed	FCSC - MACP
11	Twarita Agro Producer Company Limited	Beed	FCSC - MACP
12	Kartavya Farmer Producer Company Limited	Beed	FCSC - MACP
13	Yuvasakthi Agro Farmers Producer Company Limited	Beed	FCSC - MACP
14	LokMauli Agro Producer Company Limited	Latur	FCSC - MACP
15	Katpur Agro Producer Company Limited	Latur	FCSC - MACP
16	Vikas Agro Producer Company Limited	Latur	FCSC - MACP
17	Shree Waghoba Agro Producer Company Limited	Latur	FCSC - MACP
18	Karadkhed Agro Producer Company Limited	Latur	FCSC - MACP
19	Sankalpana Agro Producer Company Limited	Latur	FCSC - MACP
20	Shri Udaygiri Agro Producer Company Limited	Latur	FCSC - MACP
21	Atola Farmer Producer Company Limited	Latur	FCSC - MACP
22	Hasori Agro Producer Company Limited	Latur	FCSC - MACP
23	Anmol Farmer Producer Company Limited	Latur	FCSC - MACP
24	Raosaheb Patil Agro Producer Company Limited	Latur	FCSC - MACP
25	Veerbhadreshwar Agro Producer Company Limited	Latur	FCSC - MACP
26	Raghukul Agro Producer Company Limited	Latur	FCSC - MACP
27	Clean o' Pack Producer Company Limited	Osmanabad	FCSC - MACP
28	Sanktakrupa Agro Producer Company Limited	Osmanabad	FCSC - MACP
29	Terna Agro Producer Company Limited	Osmanabad	FCSC - MACP
30	Ganrajya Agro Producer Company Limited	Osmanabad	FCSC - MACP
31	Manjara Agro Producer Company Limited	Osmanabad	FCSC - MACP
32	Khamaswadi Farmer Producer Company Limited	Osmanabad	FCSC - MACP
33	Brahmnath Farmer Agro Producer Company Limited	Osmanabad	FCSC - MACP
34	Jay Bhavani Agro Producer Company Limited	Osmanabad	FCSC - MACP
35	Ajinkya Farmer Agro Producer Company Limited	Osmanabad	FCSC - MACP
36	Pareshwar Farmer Agro Producer Company Limited	Osmanabad	FCSC - MACP
37	Lokseva Farmers Agro Producer Company Limited	Osmanabad	FCSC - MACP
38	Sant Shiromani Maruti Maharaj Agro Producer Co. Limited	Osmanabad	FCSC - MACP
39	Sai Baba Agro Producer Company Limited	Osmanabad	FCSC - MACP
40	Lahankar Agro Producer Company Limited	Nanded	FCSC - MACP
41	Bember Agro Producer Company Limited	Nanded	FCSC - MACP
42	Vitthaleshwar Farmers Producer Company Limited	Nanded	FCSC - MACP
43	Purvareshar Agro Producer Company Limited	Nanded	FCSC - MACP
44	Dharmabad Agro Producer Company Limited	Nanded	FCSC - MACP
45	Tamsa Parisar Farmer Producer Company Limited	Nanded	FCSC - MACP
46	Shri Guru Samarth Producer Company Limited	Nanded	FCSC - MACP
47	Guru Gobind Singhji Manar Agro Producer Co. Limited	Nanded	FCSC - MACP
48	Yogiraj Nivruti Maharaj Agro Producer Company Limited	Nanded	FCSC - MACP
49	Barbada Parisar Agro Producer Company Ltd.	Nanded	FCSC - MACP
50	Rashtramata Jijau Agro Producer Company Ltd.	Nanded	FCSC - MACP
51	Bhagyavidhata Shetkari Producer Company Ltd.	Nanded	FCSC - MACP
52	Renukamata Agro Producer Company Limited	Aurangabad	NABARD POPI
53	Aliyabad Agro Producer Company Limited	Osmanabad	NABARD POPI
54	Boltek Agro Producer Company Limited	Aurangabad	NABARD POPI
55	Devi Dakshyani Agro Producer Company Limited	Aurangabad	NABARD POPI
56	Gautala Agro Producer Company Limited	Aurangabad	NABARD POPI
57	Jan Jagruti Agro Producer Company Limited	Aurangabad	NABARD POPI
58	Karhol Producer Company Limited	Aurangabad	NABARD POPI
59	Sant Sevalal Producer Company Limited	Aurangabad	NABARD POPI
60	Kalu Peer Baba Farmer Producer Company Limited	Aurangabad	NABARD POPI
61	Munjababa Shetkari Producer Company Limited	Aurangabad	NABARD POPI
62	Sarvatirtha Agro Producer Company Limited	Aurangabad	NABARD POPI
63	Nandkheda Producer Company Limited	Jalna	NABARD POPI
64	Varkheda Farmer Shetkari Producer Company Limited	Jalna	NABARD POPI
65	Patur Agro Producer Company Limited	Akola	NABARD POPI
66	Diamond Agro Producer Company Limited	Aurangabad	NABARD POPI
67	Lingdari Farmers Producer Company Limited	Aurangabad	NABARD POPI
68	Gomata Pashudhan Vikas Shetkari Producer Co. Limited	Aurangabad	NABARD POPI
69	Hiwra Agro Agro Producer Company Limited	Aurangabad	NABARD POPI
70	Latifpur Agro Producer Company Limited	Jalna	NABARD POPI
71	Samakimata Farmers Producer Company Limited	Aurangabad	NABARD POPI
72	Murumkheda Agro Producer Company Limited	Aurangabad	NABARD POPI
73	Girijamata Agro Producer Company Limited	Jalna	NABARD POPI
74	Tatyababaa Pomegranate Producer Company Limited	Aurangabad	NABARD POPI
75	Ajra Agro Producer Company Limited	Kolhapur	FCSC MACP
76	Rangana Agro Producer Company Limited	Kolhapur	FCSC MACP
77	Gadhira Agro Producer Company Limited	Kolhapur	FCSC MACP
78	Shetkari Vikas Agro Producer Company Limited	Kolhapur	FCSC MACP
79	Doodh Ganga Agro Producer Company Limited	Kolhapur	FCSC MACP
80	Jivhala Farmers Producer Company Limited	Kolhapur	FCSC MACP
81	Atal Agro Producer Company Limited	Kolhapur	FCSC MACP
82	Shree Balumama Agro Producer Company Limited	Kolhapur	FCSC MACP
83	Khanai Devi Shetkari Agro Producer Company Limited	Kolhapur	FCSC MACP
84	Green Sudha Agro Producer Company Limited	Kolhapur	FCSC MACP
85	Family Farming Agro Producer Company Limited	Kolhapur	FCSC MACP
86	Datta-Uday Agro Producer Company Limited	Kolhapur	FCSC MACP
87	Karmveer Agro Producer Company Limited	Kolhapur	FCSC MACP
88	Sambhajiraokadam Agro Producer Company Limited	Sangli	FCSC MACP
89	Yeshwanti Agro Producer Company Limited	Sangli	FCSC MACP
90	Shree Mahaganapati Agro Producer Company Limited	Sangli	FCSC MACP
91	Surabhi Farmers Producer Company Limited	Sangli	FCSC MACP
92	Sitamai Agro Producer Company Limited	Sangli	FCSC MACP
93	Shivar Farmers Producer Company Limited	Sangli	FCSC MACP
94	Varana Mai Agro Producer Company Limited	Sangli	FCSC MACP
95	Shahaji Agro Producer Company Limited	Sangli	FCSC MACP
96	Siddhanath Nerle Farmer Producer Company Limited	Sangli	FCSC MACP
97	Ratna Farmer Producer Company Limited	Sangli	FCSC MACP
98	Joyful Farmer Producer Company Limited	Sangli	FCSC MACP
99	Maralanath Agro Producer Company Limited	Sangli	FCSC MACP
100	Mangana Agro Producer Company Limited	Sangli	FCSC MACP
101	Shetkari Praja Producer Company Limited	Sangli	FCSC MACP
102	Farandwadi Krushikranti Agro Producer Company Limited	Satara	FCSC MACP
103	Nagthane Agro Vision Producer Company Limited	Satara	FCSC MACP
104	Krushi Sagar Agro Vision Producer Company Limited	Satara	FCSC MACP
105	Talmavale Agro Producer Company Limited	Satara	FCSC MACP
106	Yogeshwar Krushi Producer Company Limited	Satara	FCSC MACP
107	Krishna Koyana Agro Producer Company Limited	Satara	FCSC MACP
108	Shri Yamai Agro Producer Company Limited	Satara	FCSC MACP
109	Gopal Krishna Agro Producer Company Limited	Satara	FCSC MACP
110	Kalpataru Agro Producer Company Limited	Satara	FCSC MACP
111	Venna Vally Agro Producer Company Limited	Satara	FCSC MACP
112	Ramrajya Foods Producer Company Limited	Satara	FCSC MACP
113	Sajag Shetkari Producer Company Limited	Satara	FCSC MACP
114	Saswad Agro Producer Company Limited	Satara	FCSC MACP
115	Shri Sant Navjinath Agro Producer Company Limited	Satara	FCSC MACP

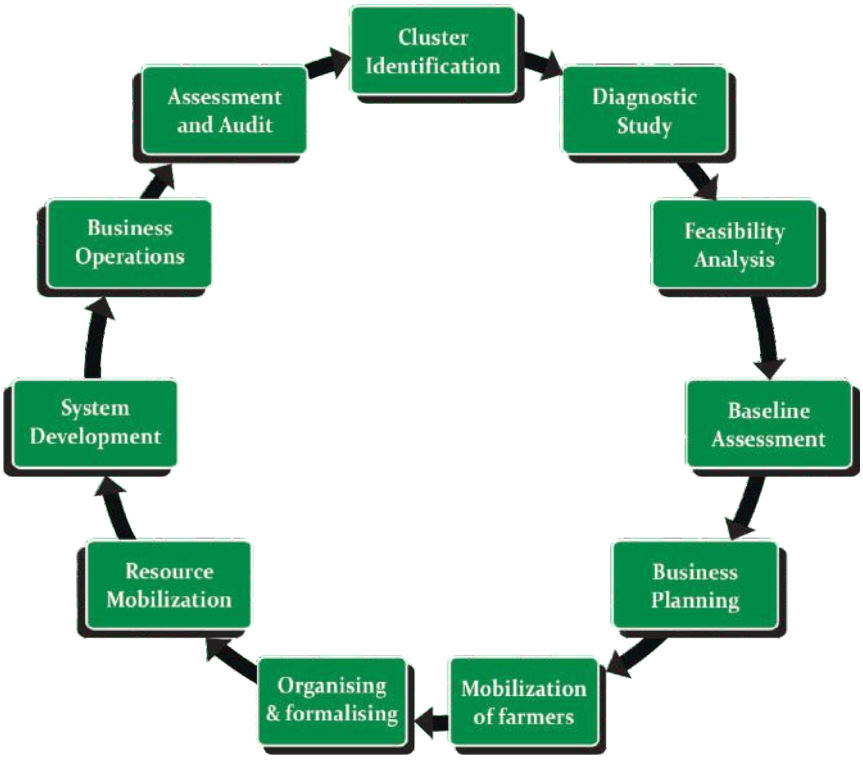
The benefit to the farmers of Marathwada

Collectivization of producers, especially small and marginal farmers, into producer organizations has emerged as one of the most effective pathways to address the many challenges of agriculture but most importantly, improved access to investments, technology and inputs and markets.

Department of Agriculture and Cooperation, Ministry of Agriculture, Govt. of India has indentified farmer producer organization registered under the special provisions of the Companies Act, 1956 as the most appropriate institutional form around which to mobilize farmers and build their capacity to collectively leverage their production and marketing strength.

- Mobilizing farmers into groups of between 15-20 members at the village level (called Farmer Interest Groups or FIGs) and building up their associations to an appropriate federating point i.e. Farmers Producer Organizations (FPOs) so as to plan and implement product-specific cluster/commercial crop cycles.
- Strengthening farmer capacity through-agricultural best practices for enhanced productivity.
- Ensuring access to and usage of quality inputs and services for intensive agriculture production and enhancing cluster competitiveness.
- Facilitating access to fair and remunerative markets including linking of producer groups to marketing opportunities through market aggregators.

FPO Promotion and Development Process



FPOs in Marathwada under SFAC

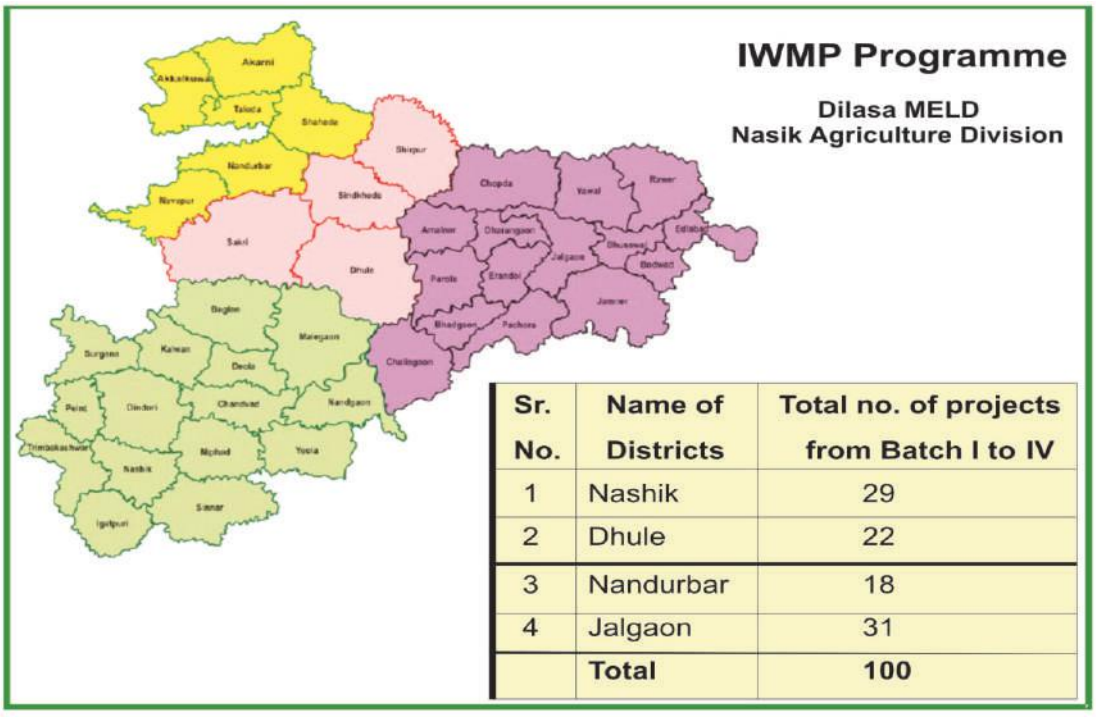
The districts that are covered under SFAC are Aurangabad, Latur, Beed, Nanded and Osmanabad. There are 5 FPOs that have to be made in every district one each. The major crops that are being grown here is Onion, Chilli, Brinjal, Tomato, Potato, Palak, and Guar. There is a major coverage of these vegetable crops. The irrigation facility followed by them is mainly sprinkler. The farmers are growing these vegetable crops and selling it to the market at lower price due to inefficiency of market reach and better customers. By FPOs initiation what they can get benefitted is the returns can be increased. The process followed by them regarding the vegetables being produced there is cleaning and grading of it and based on the category they will approach the market for better returns.

The forward and backward integration can be taken care of properly, the cost of input purchase can be drastically reduced and the drudgery they have for better market can be reduced at a very higher level because of the market linkage with Super markets, the Exporting agencies and the online vendors. In this way the members of the FPO will have better support by the RI ie; Dilasa which will facilitate all their requirement at right time, right price and right quality with the right source.

12

MELD Agency for IWMP : Project of Nasik Agriculture Division

Dilasa is working as a Monitoring, Evaluation, Learning's and Documentation (MELD) agency for Nashik division under Integrated Watershed Management Programme (IWMP) covering Nashik, Dhule, Nandurbar and Jalgaon districts of Maharashtra. Dilasa acts as a facilitating agency at the village level and it is actively involved in conducting monitoring and evaluation of a total of 100 IWMP projects in Nashik Agriculture division, the same is depicted in the following diagram:



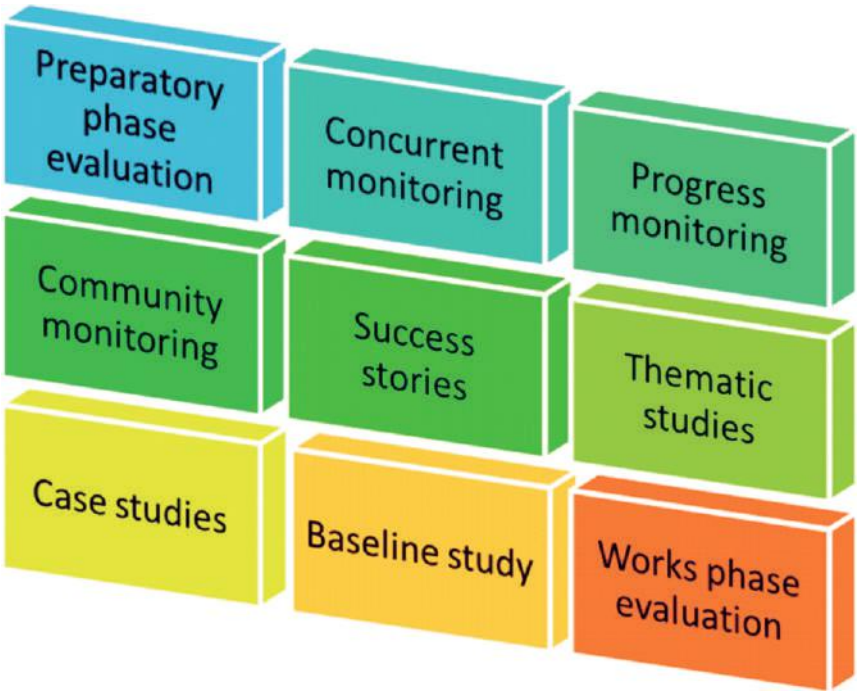
Sr. No.	Name of Districts	Total no. of projects from Batch I to IV
1	Nashik	29
2	Dhule	22
3	Nandurbar	18
4	Jalgaon	31
	Total	**100**

This annual report gives an account of the tasks and activities undertaken by Dilasa Janvikas Pratishthan from August 2013- September 2014 pertaining to the Monitoring and Evaluation of IWMP projects in Nashik agriculture Division.

The M&E Team: Core team

Along with the core team, 20 field monitors have been successfully working on the accomplishment of concurrent monitoring and data collection, communication with village level institution for other MELD tasks.

Activities under MELD

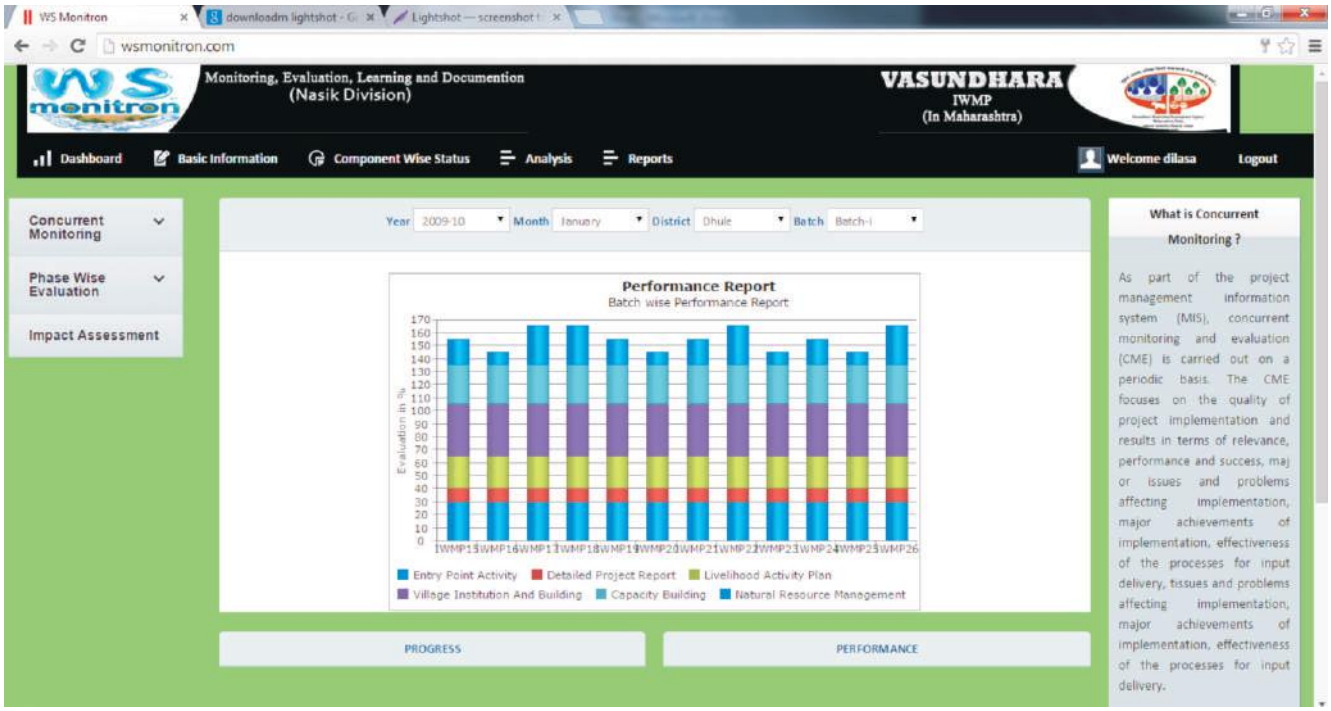


Commitment of Dilasa as a MELD Agency

Software generation:

Dilasa is the only MELD agency to have proactively developed software for recording the data collected at the field level. The underlying motive to come up with such an innovative concept is to get unbiased analysis of the Monitoring and Evaluation of all the projects. Concurrent Monitoring is a monthly monitoring process for a period of 5 years. Under this, for every district has to furnish 60 reports, same case for 4 districts. Manually handling these reports and to bring out observations and their synchronisation with the proposed process as mentioned in the common guidelines, it becomes necessary to imbibe it in the form of a software so as to automatically generate and sync through coding.

We can also identify if the process is on track or lagging behind. Similarly, in the future there are going to be different types of Monitoring and evaluation and consolidating the same is not going to be manually possible. It will also be helpful to the district and the PIA for consolidated compliance tracking progress.



Facilitation in motivating the stakeholders through monitoring:

Awareness at the village level is very important as community should be aware about the activities implemented at the village level. This also brings about active participation at the village level. For this purpose, Dilasa has adopted innovative methods for generating awareness amongst the Village Level Institutions (VLI) such as the Watershed Committee (WC). A brief report of continuous monitoring is prepared which consists of the available records maintained at the WC level. Also, the expected improvements component is included in the brief report. This will help in continuous improvement during the visits. A copy of the same is maintained at the WC level, at the PIA level and with the MED agency. At all levels of the M & E process the Team Leader has coordinated and facilitated with the district and all the stakeholders involved in the working of Dilasa as a MELD agency. Core team members of MELD team are also actively participating in the field level interactions with the stakeholders and it is conveyed that Dilasa is acting as a facilitating agency and not an inspecting agency which has proved to be helpful in building rapport with the village level institutions.

Dilasa Janvikas Pratishthan as a facilitator and Coordinator

MELD team is considered to be the "EYES and EARS" for evaluation and monitoring. It is considered to have no mouth. This depicts that the MELD team is considered to be acting as a facilitator and not as an inspector. At Dilasa, the MELD team- especially the field team members have maintained that they act as a facilitator. This has helped the PIA –WDT members to build the trust at the local village level. The MELD team is involved in the monitoring wherein the planning is done after which observations are made and directly reported in the form of a report. The MELD team is not supposed to give suggestions regarding the improvements at the village level. The MELD team has also maintained coordination at various levels in the hierarchy of the IWMP. This has helped in maintaining awareness at all levels in the IWMP hierarchy in Nasik Division.

MELD is an integral part of IWMP. Proper planning is half done. The same concept is build among the team members of MELD for monthly planning.

Planning has been done in a systematic manner with the field monitors deciding upon the schedule in every first week of the month.

The same has been depicted in the following pictogram which depicts the working and coordination maintained by the Dilasa team because the wheel moves in such smooth manner thus facilitating coordination.

WCDC level meeting

Dilasa MELD has maintained smooth communication with WCDC level as well. A Nashik WCDC meeting was conducted where MELD roles and responsibilities and major observations were shared and submitted in the form of a hard copy. This meeting in presence of Additional Collector of NashikDistrict. Meeting with the Divisional Commissioner Shri. Eknath R. Dawale by team leader to give him briefing about the concept of MELD and some proposed tasks discussions.

13

State Resource Organization (SRO) : Trainings for IWMP Project

Dilasa has been selected as the State Resource Organization (SRO) for the Integrated Watershed Management Programme (IWMP) by Department of Land Resources project and has conducted training programme on the livelihood development in 14 districts of the state and trained more than 1000 participants. Apart from livelihood development Dilasa is also conducting the trainings for social mobilization, agriculture management, agriculture engineering, as well as farmer producer organization.

Livelihood Development Training Contents

- Orientation to common guidelines 2011.
- Livelihood Development- Concept and Importance
- Challenges affecting Livelihoods in Rural areas, Ways forward and Livelihood Support Systems
- Income-Generation/ Self-Employment / Entrepreneurship
- Entrepreneurship Development- Concept, Need, Relevance, Importance
- Business Opportunity Search and Scan(BOSS) – Concept and Importance
- Methodology to be used for BOSS (Village Data Sheet, Cluster profile, PRA)
- Exposure visits- PRA for identifying Business opportunities
- Preparation of business Plan/Profiles
- Methodology for preparation of Livelihood Action Plan(LAP) Tables/

- Formats, Exercise on Preparation of LAP for the Cluster
- Markets- Marketing -Marketing Management
- Book Keeping, Accounting, Legal issues, Work ethics& Values,
- Convergence with different schemes
- Exposure Visits-Interviewing Successful entrepreneurs, Failed Ones, discussions with rural institutions for Livelihood development.
- Production enhancement, Value addition in Agriculture Produce, Methodologies & Strategies.

Social Mobilization Training Content

- Orientation to common guidelines 2011.
- Social Work - concept, present trends, methods and techniques
- Issues and Challenges in Social Work
- Method of Community Mobilization- Individual Interactions and Rapport building
- Method of Community Mobilization- Meetings, Awareness camps, Exposure Visits, Displays and Exhibitions, Audio Visual Aids
- Attitude and Behavioral change, Leadership concept and types
- Gender Sensitivity
- Socio-Economic Survey
- Importance of Community based Organizations in Watershed management
- Concept and Formation, Functioning and Management of Self Help Groups(SHG)
- Functioning of Watershed Committee and User's groups(UG)
- Conflict Management
- Documentation – Report Writing, Proceedings of Meetings

Agriculture Management Training

Contents

- Orientation to common guidelines 2011.
- Agriculture - Challenges in Maharashtra and changing role under IWMP
- Farmers group farmation, benefits and workflow
- Farmer Producer Organisation (FPO) formation

-Need and Importance

- Activities under FPOs
- Soil testing and survey, soil suitability and classification and land use
- Common property resource management, Forest and Pasture area management.
- Plantation and its maintenance.
- APMC Act and Seed Act
- Agriculture-based Livelihood Development- Buffalo rearing, Cow rearing, Goat rearing
- Agriculture and Mechanisation
- Marketing of Agriculture produce
- Land availability-based Orchard development and management
- Coordination and Convergence of Agriculture and Government scheme.
- Management of Integrated Farming
- Organic Farming–Meaning,Importance, Methods, Advantages and Disadvantages
- Irrigation Management (water Management) GPRS use in IWMP.

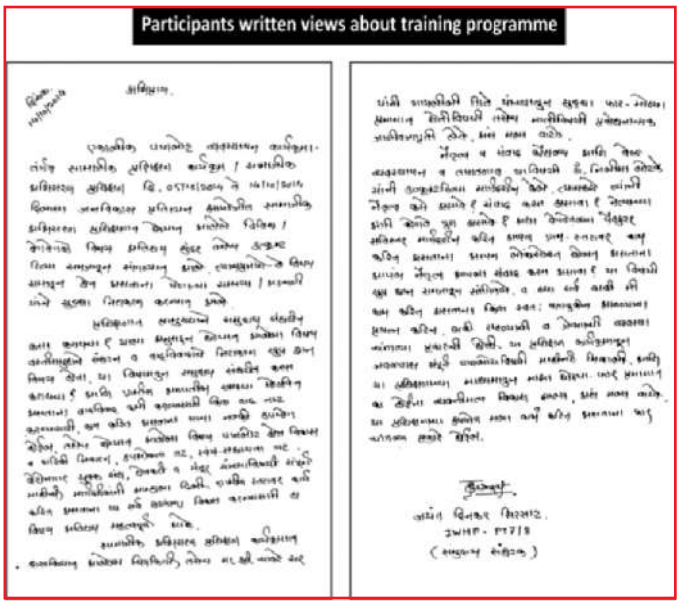
Agriculture Engineering Training Contents

- Orientation to common guidelines 2011.
- Importance of Natural Resource Management and Climate Change Adaptation.
- Concept of Watershed, different types of watershed, Watershed development, Different components in watershed development
- Delineation of watershed using Toposheets and cadastral maps, Treatments in watershed development, Operational guidelines of IWMP
- Major Engineering structures – Inputs on site selection, design, estimate and execution and measurement-Loose Bold Structure (LBS) & Gabion, Check Dam (CD) & Earthan Nala Band (ENB).
- Use of Hydromarker for Continuous Contour Trenches (CCT), Marking and slope, Use of Auto level for Practical exercise in Longitudinal sections and Cross Sections
- Orientation to Net planning concept & land use classification
- Exposure Visit to ongoing and completed watershed projects
- DPR formats explanation
- Recording of Measurement book for all treatments -IWMP guidelines (GoM)
- Monitoring systems and Impact assessment methods.

Training Feedback Tracking System

At the final session of training, we take feedback about training session and training arrangement, through evaluation forms filled by individual participants as well as YASHADA's online feedback process for individual participants to fill on Survey Monkey Database. The purpose of the feedback is to assess how much the trainee has been able to grasp through the training sessions.

However, it has been observed that after some days, trainees find it difficult to retain all that they learnt during the training sessions. Taking due note of this, Dilasa Janvikas Pratishthan in addition to YASHADAs online feedback, recently started a new system of tracking - as evaluation of trainign and feedback from trainees periodically. In the training feedback tracking system, after one month, Dilasa sends 10 questions to all trainees email id and gets feedback from all of them. After three months, this process is repeated, this time by giving them 20 questions and taking online feedback from all of them. After checking all the feedback, Dilasa recalls the trainees who require a refresher training and arranges refresher training for them. Dilasa sends the feedback evaluation form to all trainees from dilasasrofeedback@gmail.com



Cross Learning Visits

Dilasa applies innovative techniques and ideas in capacity building programme. During the training programme, Dilasa arranges subject related exposure visits as well as cross visits related to Integrated Watershed Management Programme. viz. For agriculture stakeholders we arrange cross visits like some successful entrepreneur, SHGs and for livelihood expert and social mobilizer we arrange cross visits like ideal watersheds, successful NRM structures and farmer visits, organic farming, nursery, etc. Because of such visits stakeholder get to clear their ideas regarding IWMP.

Dilasa Published Reading Material

1) Way to Livelihood in marathi
2) पाणलोटाची देखभाल (Maintenance of Watershed) in marathi
3) बचत गट : महिलांचा आधारवड (Self Helf Group : Backbone of Womens development) in Marathi
4) शेतकरी गट : कृषी विकासाची गुरूकिल्ली (Farmers Group: key to Agriculture Development in Marathi
5) पाणलोट प्रभावाचे सहभागीय मूल्यावलोकन Participatory rural appraisal of watershed in Marathi
6) विदर्भातील प्रेरणादायी यशोगाथा : बोरगाव Watershed suscess story of vidharbha: Borgaon in Marathi
7) विदर्भातील प्रेरणादायी यशोगाथा : दुधलम Watershed suscess story of vidharbha: Dudhalam in Marathi
8) शाश्वत समृद्धीसाठी सोयाबीन Soyabean for sustainable prosperity in Marathi.
9) Bridging the Gap (on Drip Irrigation)
10) कच्चेघाटी : पाणलोट यशोगाथा Kaccheghati : watershed suscess story in Marathi

14

NABARD supported : Watershed Development Fund (WDF)

Executive Summary

Dilasa Janvikas Pratishthan is working as Project Implementing Agency (PIA) for Aliyabad, Manmodi and Jalkotwadi watershed in Tuljapur block of Osmanabad district since 2011-12. The project is being financially supported by NABARD under watershed development fund (WDF). BAIF is working as Resource Support Organization for these 03 watersheds. The main objective of project is to increase the agriculture productivity through watershed development interventions. The major interventions are a) Area treatment such as Afforestation (AF), Crop Cultivation (CC), Dry Land Horticulture (DH)and Agro Horticulture (AH) b) Drainage Line Treatment such as Loose Boulder Structures (LBS), Gabion Structure (GB), Earthen Nalla Bund (ENB) in addition to Training & Demonstration, Women Development and Livelihood. All PIA has been completed almost all activities as per targeted plan; remaining few activities will be completed within period of 04 months.

The methodology used for impact assessment is personal interactions, Focus Group Discussion and field observations.

The project is having impact on Land use, Irrigation, cropping Pattern, Productivity, Fuel wood & fodder Availability and Livestock. The overall impact of project is increasing water table height, income & employment generation through agriculture and watershed works and decreasing in migration percentage. The impact indicates that such watershed projects can affect drought to certain extent from income & employment and water availability point of view.

About the project

The project named 'Watershed Development Fund (WDF)' was sanctioned by NABARD, Pune in 2011 for 03 watersheds namely Aliyabad, Manmodi & Jalkotwadi in Tuljapur block of Osmanabad district. Total area covered was 3232.24 Hectares. Major Interventions covered are as follows:

Area treatment such as : Afforestation (AF), Crop Cultivation (CC), Dry Land Horticulture (DH), Agro Horticulture (AH),

Drainage Line Treatment such as: Loose Boulder Structures (LBS), Gabion Structure (GB), Earthen Nalla Bund (ENB), Training & Demonstration, Women Development and Livelihood.

Process adopted

For impact assessment study, Dilasa has conducted meeting with senior staff members before

conducting study to clarify the objective of this study and to finalize structured questionnaire, process of data collection, field visits, FGD, farmers interview etc. The collected data has been validated and analyzed. Following flow chart indicates about process adopted:

Sample Size

Dilasa is implementing three watersheds in three villages, so that we have selected all three villages with 10 farmers per village i.e. total 30 farmers from

District : Osmanabad	Block : Tuljapur
Watershed villages	**Control villages**
Aliyabad	Ramtirth
Jalkotwadi	Rudrawadi
Manmodi	Phanepur

watershed area. One control village adjoinig to each watershed village has been selected in addition to 10 farmers per control village.

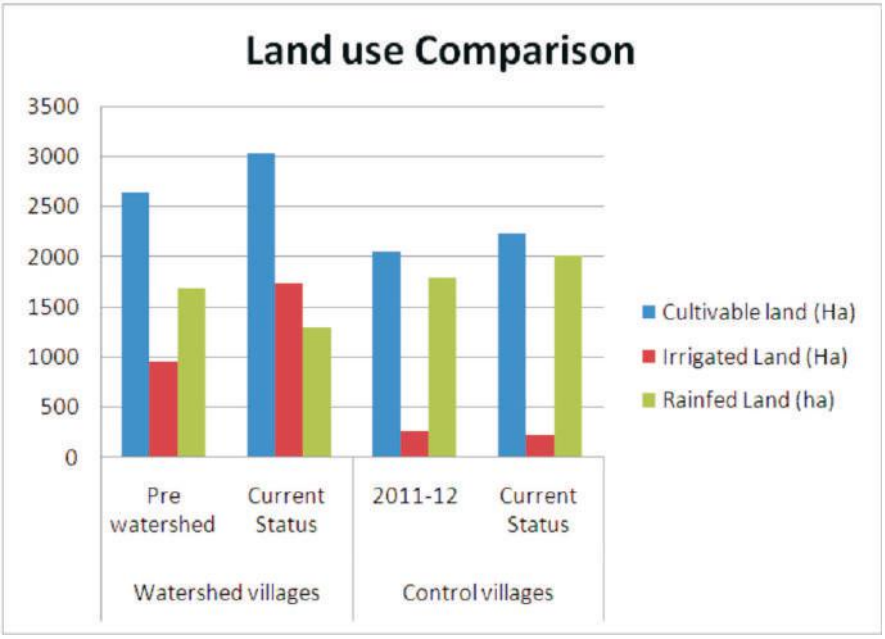
Findings

Land use:

Watershed Areas: Cultivable land has been increased by 390 hectare in all three watershed area earlier it was 2641 hectares before watershed implementation. Irrigated area has been increased by785 hectare earlier it was 950 hectares and rainfed area has been decreased by 395 hectare earlier it was 1691 hectares before watershed implementation. Watershed wise details are as follows:

Indicators	Village : Ramtirth		Village : Phanepur		Village : Rudrawadi		Total	
	2011-12	Current status	2011-12	Current status	2011-12	Current status	2011-12	Current status
Total land (ha.)	556	556	1100	1100	715	715	2371	2371
Cultivable land (ha.)	540	515	800	1000	715	715	2055	2230
Irrigated land (ha.)	85	60	100	100	75	60	260	220
Rainfed land (ha.)	455	455	700	990	640	655	1795	2010

Following chart indicates the Land use pattern in watershed & control villages

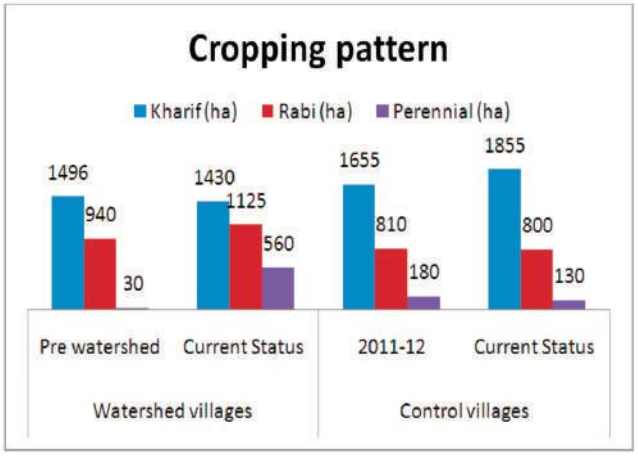


came up with a need of a vegetable pack house. The vegetables shall be graded, cleaned and packed based on the market needs, which would add value to their produce. The company has the capacity to process more than 2.

Cropping Pattern

Before implementation of watershed programme, farmers were cultivating Hybrid Jawar, Tur and Bajra in Kharif season while in Rabi season they were cultivating Jawar & gram. Now it seems that cropping pattern is slightly changing which indicates that Hybrid jawar is completely replaced by soyabean and pulses in Kharif season, however, wheat crop area is increasing in rabi season in addition to jawar & gram. Sugarcane is being replaced by other fruit crops and mainly grapes in case of Osmanabad district. Farmers are adopting modern agriculture practices and understanding importance of water which is being reflected in their crop selection. Study indicates that productivity of rabi crop has been increased due availability of water for more than two months in rabi season. Area under perennial crops is tremendously increased due to water availability.

However, in Control villages, there is no major difference in cropping pattern. Most of the farmers are depend on Kharif season. Season wise cropping area for watershed and control villages has been mentioned in below chart:

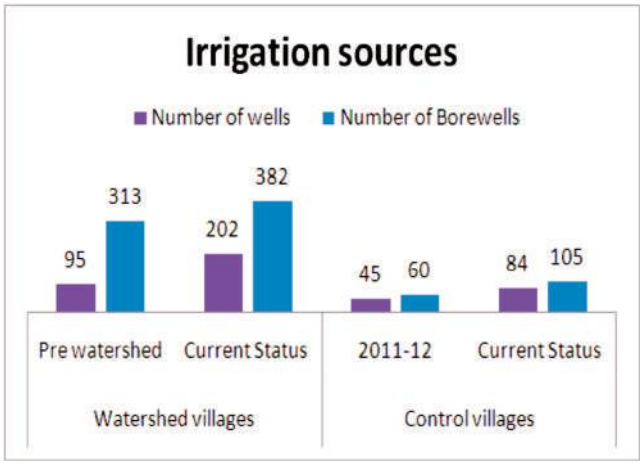


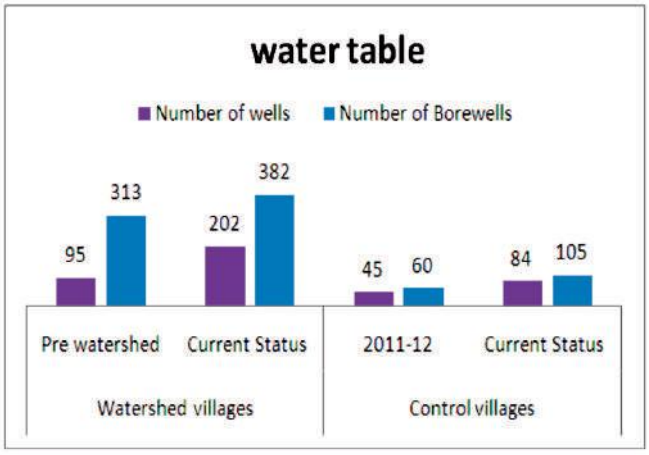
Above chart indicates that Kharif area has been reduced in watershed villages while it is increased in control villages. Rabi area & perennial area has been increased in watershed villages while it is reduced in control villages.

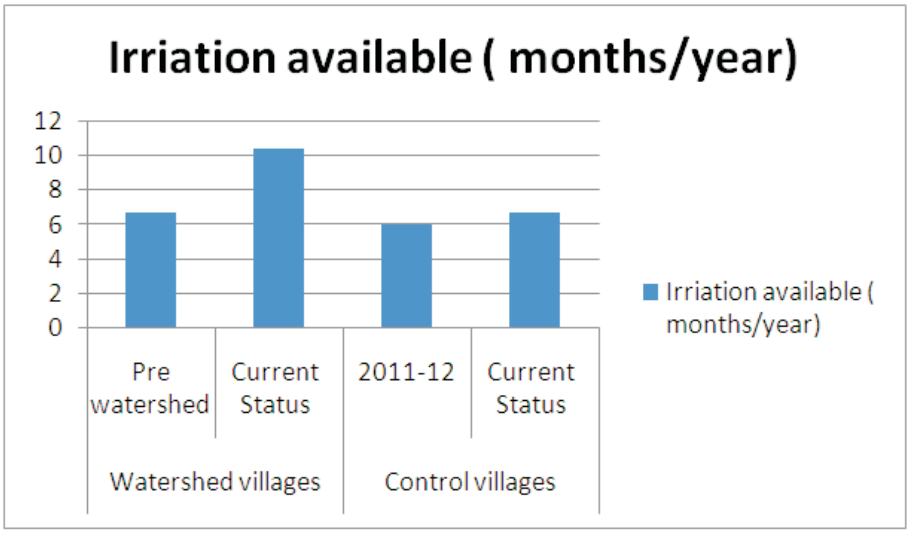
Irrigation

Water table height is being decreased across all villages including control villages due to continuous drought in the project area since last 3 years, but it is more critical in case of control villages comparatively. Numbers of wells have been increased by 2.5 times in watershed area; however it is increased by two times in control villages over period of three years. . Number of bore wells are increased by 20% in watershed villages however it is

been increased by 100% in case of control villages. Following charts indicates status of irrigations sources such as wells & borewells, water table height and period of water availability for irrigation purpose:

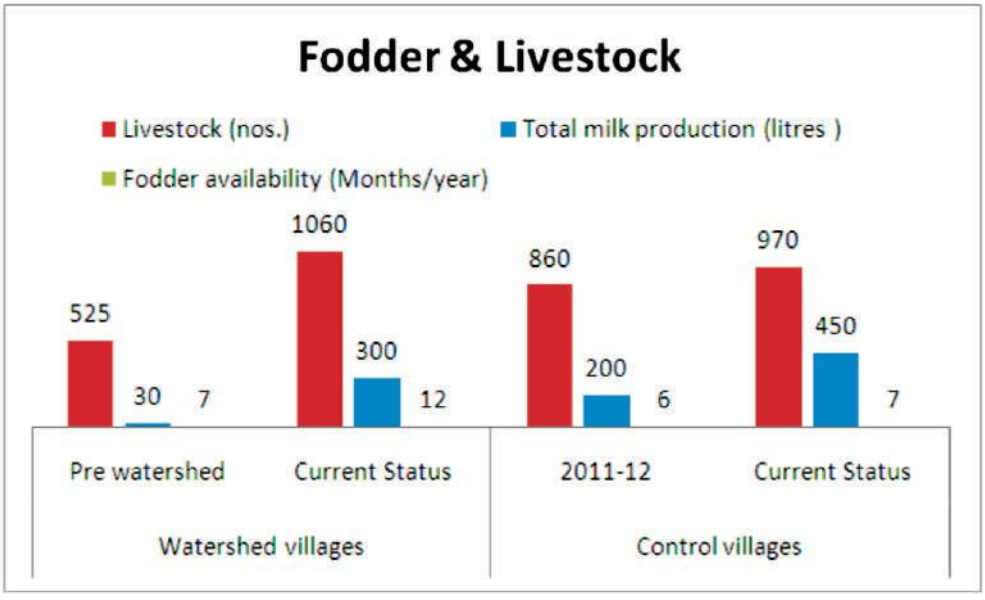






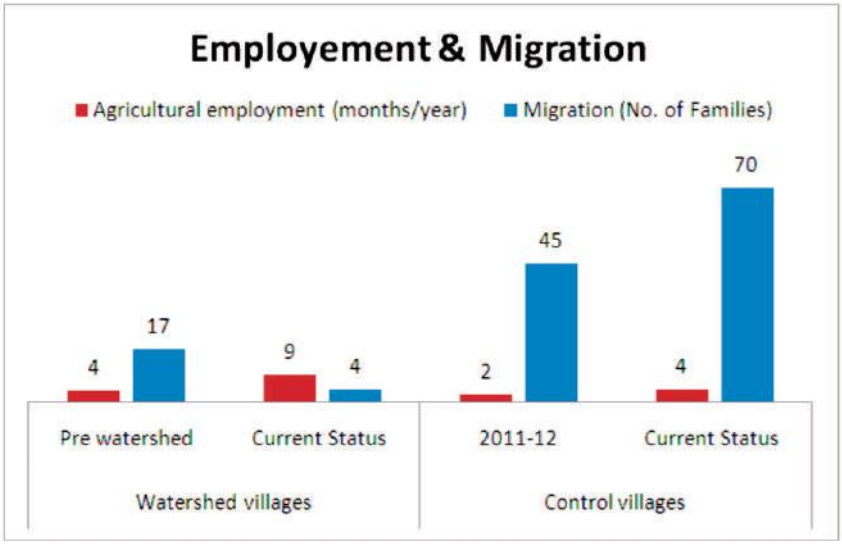
Fodder availability & Livestock

In the watershed area, fodder availability is increased by five months, earlier it was only for seven months. This has impact on number of animals which are being increased and farmers are getting additional income from their livestock by selling milk & meat animals such as goats. Quantity of milk production is increased by ten times more earlier it was 30 litres per day, however.



Socio-Economic Impact

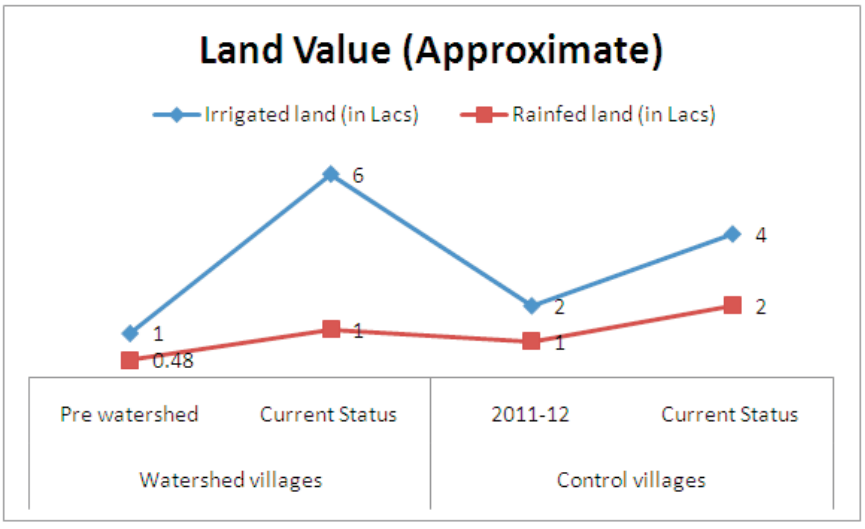
Income & Employment Generation



Above chart indicates that earlier Agri. employment was available for 4 months in a year which is now 9 months and 17 families were migrating for their livelihoods, now only 4 families are migrating in watershed area. However in control villages Agri. employment is available only for four months and numbers of migrating families has been increased by two times than earlier i.e. 2011-12

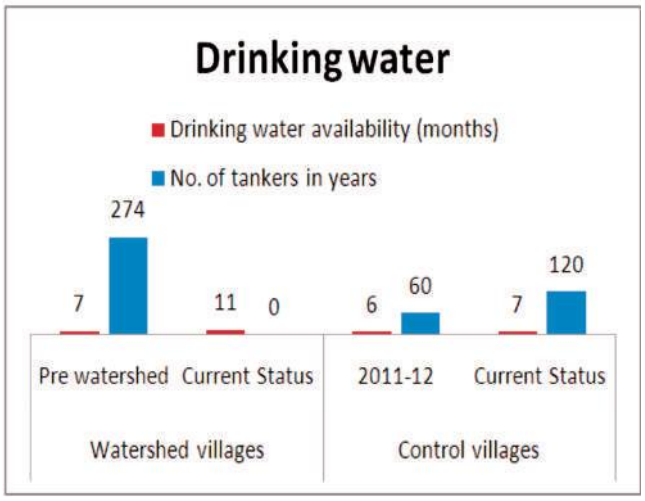
Impact on Land Value

Land value of irrigated land is being increased by almost six times in case of watershed villages while in case of control villages land value increased by four times only. It means there is advantage of additional two time's value for irrigated land due to watershed programme. There is no much more effect on rainfed land in both cases. Following chart indicates trend of land value in watershed as well as in control villages:



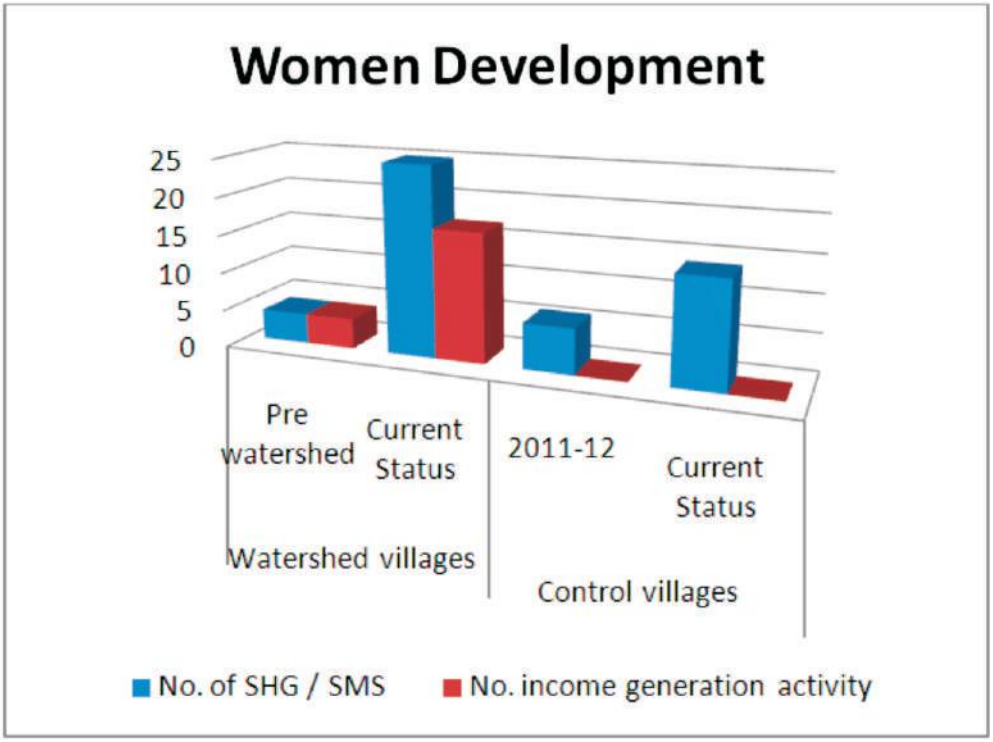
Drinking Water Status

The chart indicates that drinking water is available for 11 months in a year and use of tankers has been reduced in watershed villages, however in control villages, drinking water is available only for period of 6-7 months and use of tankers has been increased by more than two times.



Capacity Building & Peoples Participation

In watershed villages, active participations of villagers have been observed which was not seen in control villages. Most of the farmers were involved in village level institutions such as producer groups, village watershed committee and farmers producer organization (FPO) which was not observed in control villages. This was possible due to capacity building programmes organized by PIA. Women awareness and their Involvement in project activities were observed in watershed villages. Following chart shows status of activity related to women:



15

Jalyukt Shivar : Rapid Assessment with Monitoring

Dilasa Janvikas Pratishthan is identified as the monitoring & evaluation agency for the Jalyukta Shivar, the flag ship programme of Government of Maharashtra. Presently, the organization had completed the Rapid Assessment of Jalyukta Shivar in Nandurbar, Dhule, Nasik and Jalgaon districts. The Water Conservation Department of the State Ministry directed to complete the Rapid Assessment within 11 days as it was very urgent for the Government to take the further direction. Dilasa is the only organization which had completed its rapid assessment along with the monitoring report to the Government instantly.

Implementation

- Training to field staff about impact study rationale involving them for their responsibilities.
- Guidance for Data collection and filling the formats onsite with specific analysis format sheet.
- Keeping track on work done.

- Conducted meeting with DSAO and TAO and planning of field visit.
- Facilitate village level FGD to assess impact of JSA
- Conducted interview with concerned govt. Officials such as DSAO/APM/TAO/other
- Conducted Household survey of primary stakeholders such as farmers, landless, women, representatives of GP
- On sight visit to check quality of work/structures
- Capturing photos and location (longitude / latitude)
- Scrutinized data collection forms.
- Data processing in excel sheet.
- Submission of district wise filled data sheets
- Preparation & submission of district wise summery report in English.
- Kept excellent co-ordination between team members and field staff by properly distributing respective responsibilities from planning and during execution.

Govt. of Maharashtra had under JSA in 34 districts including 6202 villages and was committed to conduct third party assessment of JSA. Extend JSA in new villages with necessary improvements in policy and structure. Sample based Rapid Impact Assessment was undertaken with broad parameters related to Major Objectives and Intermediary Expected Outcomes of JSA. Impact was observed compared with 2014-15. The main features were - storage capacity created, DW well level, DW situation, cropping intensity – Kharif & Rabbi, Seasonal/protective irrigation. Productivity – three major crops of Kharif. Gross Income of three major crops of Kharif. However, people's participation & Ownership was the vital issue with their quantum of work. Then the Government asked to produce district wise summery report.

Formats Developed

Data set, Focus Group Discussion, 3. Interview of primary stakeholder, 4. Interview of secondary stakeholder, etc.

The training to field staff about impact study rationale was conducted by involving them for their responsibilities. Then the guidance for data collection and filling the formats onsite with specific analysis format sheet was narrated. Dilasa conducted meeting with DSAO and TAO and planning of field visit as per the guidelines. Then facilitated village level FGD to assess impact of JSA. As a parts of the process interviews were conducted of the concerned Govt. officials such as DSAO / APM / TAO /other. The organization conducted household survey of primary stakeholders such as farmers, landless, women and representatives of GP. Then the team of Dilasa went for on sight visit to check quality of work/structures. The special responsibility was given for the capturing photos and location (longitude/latitude) for the report writing. After this on site process, Dilasa simultaneously scrutinized data collection forms and data processing in excel sheet. After the submission of district wise filled data sheets, the summary report in English was prepared for the submission to the district. All this process was done by Dilasa Team within 11 days.

16

Jalyukta Shivar : Evaluation of three districts

Maharashtra government has launched the project "Jalyukt Shivar Abhiyaan" in a bid to make Maharashtra a drought-free state by 2019. The project involves deepening and widening of streams, construction of cement and earthen stop dams, digging of farm ponds. The mobile app, developed by MRSAC, is being used to map these locations. The mapped location can be monitored through this web page. The user will be able to download the application, view instruction manual and view mapping locations along with photographs. District-wise, taluka-wise, work-wise statistics is also available both in tabular and graphics form. The project aims to make 5000 villages free of water scarcity every year.

The Chairman, Jalyukt Shivar Abhiyan District level Committee is District Collector and Joint Chairman is Chief executive officer ZP. Secretary of Jalyukt Shivar Abhiyan District level Committee is Superintending Agriculture Officer (SAO) Buldhana. All various Departments are participating under Jalyukt Shivar Abhiyan launched by Government of Maharashtra.

Photos of evaluated works under JSA

Buldhana district is in the Amravati division of Maharashtra State in Western India at the westernmost border of Vidarbha Region. The district consists of 6 subdivisions and 13 blocks. 330 villages are covered under JSA.

Jalgaon district is a district of Maharashtra, India. It was formerly known as East Khandesh district, prior to 21 October 1960, It has an area of 11,765 km², and a population of 3,682,690 (2001 census) of which 71.4% were living in rural area. It is bounded by Madhya Pradesh state to the north, and by the districts of Buldhana to the east, Jalna to the southeast, Aurangabad to the south, Nashik to the southwest, and Dhule to the west. The major crops produced in this district are banana (In Maharashtra, Jalgaon ranks as number one in banana production and 32,000 hectares area covered under cotton, sorghum, wheat, millet, lime, groundnut and sugarcane. In whole Jalgaon rain falls between the range of 77 cm and 80 cm. At eastern side of district i.e. in Yawal Taluka 77 cm. In Jalgaon, Bhusawal, Pachora 79 cm. Jamner 80 cm.

Nandurbar is located in North western side of Maharashtra State. The District Head Quarter of Nandurbar District is Nandurbar. Nandurbar district is bounded to the south and south-east by Dhule district, to the west and north is the state of Gujarat, to the north and north-east is the state of Madhya Pradesh. The northern boundary of the district is defined by the great Narmada river. The district comprises 6 talukas. These talukas are Akkalkuwa, Akrani Mahal (also called Dhadgaon), Taloda, Shahada, Nandurbar and Navapur.

Nashik is also known as Mini Maharashtra, because the climate and soil conditions of Surgana, Peth, Igatpuri resembles with Konkan, Niphad, Sinnar, Dindori, Baglan blocks are like Western Maharashtra and Yeola, Nandgaon and Chandwad blocks are like Vidarbha Region. Nashik, Malegaon, Manmad, Igatpuri are some of the big cities situated in the Nashik District. The district consists of 4 subdivisions and 15 blocks, 229 villages select in district for JSA.

17

NABARD supported : Tribal Development Programme (WADI)

The project is being implemented for 1100 tribal families in 12 tribal villages of Igatpuri block of Nashik district and 1000 tribal families in Patur block of Akola district. The main objective is to uplift socio-economic conditions of tribal families through integrated approach. The major components are: Orchard development for 1 acre area, Soil & water conservation measures for 1 acre area, Community health, Women in development activities, Income generation activities for 100 landless tribal families, Peoples organization, First three years is period of wadi establishment in phase manner and remaining 4 years for maintenance of wadi's.

WADI is the holistic project which is implemented from the seedlings to the actual fruit to the plants. It is fullflaged project which gives strength to the Adivasi's. It had given the confidence to the Adivasi families and improves the status of not only land holding families but the landless families were also considered on priority basis.

The implemented various activities in the WADI's are as follows :

- **Wadi** – As a core activity with majority of wadies of 1 acre per tribal family. Keeping in view common fruit crops grown in the Area, recommendations of Krishi Vidyapeeth & villager's inclination, we have planted Mango, and Guava crops in desired proportion of 30:28 in

one acre wadi. Orchard crops Surrounded with Glyricidia, Karvand, Sagargota, tick & Subabhul (50 each) i.e total 300 plants on the borders as forest trees.

- **Soil Conservation:** With the slope of the land less than 5 to 10 %, on an average 100 meters bund with trench will be sufficient to conserve soil & water in the wadi.
- **Water resources Development**- In order to make water available for watering the young fruit saplings in first 2-3 years, all our efforts made to collect the rain water in following ways.
- **Temporary check** dams on the nalas/rivulets at the locations close to the proposed wadis,
- Micro-irrigation units for 500 wadis have been installed for better water management.
- **Sustainable agriculture development**- Introduction of improved varieties of Pulses / oilseed crops as intercrops in-between fruit trees for initial years to get immediate returns to sustain interest of beneficiaries, Demonstration plots of improved crops/varieties are proposed under this intervention. Wadi farmers will be educated for improved agricultural practices.
- **Community development:** capacity of community build up during the project period through different programmes such as trainings, exposure visits, on wadi management, sustainability of wadis, people's organization etc. This will help to ensure active participation of beneficiaries and & Development of skills for management of wadis after project completion, it has been achieved by Promoting participants groups/village planning committees/ cooperative.
- **Women empowerment**- socio-economic development of wadi women through promotion of women SHGs, livelihood activities through IGA, Drudgery Reduction tools, active involvement in peoples organizations. Womens actively involved in wadi programme also.

- **Community Health & sanitation**- primary health care of pregnant women & young, Children, safe drinking water, kitchen gardens, etc. is being carried out during project period.

- **Promotion of micro enterprises** for landless families: 100 landless families from project area

have been identified. These families trained and linked with feasible livelihood activities.

- **Capacity building** of staff & beneficiaries in better management of wadi's, Sustainable agricultural practices, marketing skills, successful running of livelihood activities, development of strong peoples organizations.

18

Intervention for Sustainability : Better Cotton Initiative (BCI)

Cotton is a globally important and widely grown crop. It is an industry that employs around 300 million people in the early production stages alone. For millions of people, in some of the world's poorest countries, cotton is a vital and unique link to the global economy.

Cotton is natural, renewable and hugely versatile. It is a key raw material for clothing, beauty products, home furnishings and insulation. It is used by nearly every person on the planet on a daily basis. Unfortunately, its cultivation often puts stress on the planet's natural resources and threatens to undermine the long-term sustainability of the cotton sector. In some areas more attention is needed at the farm level to address inefficient irrigation techniques, poor management practices and improper use of pesticides and fertilizers, which threaten the availability of clean water, soil fertility, human health and biodiversity. Many cotton farmers also suffer from low incomes, a lack of affordable finance, and often have difficulty overcoming the barriers to organising. Farm workers may experience arduous working conditions (particularly women), and in some regions, child labour and forced or bonded labour persist. We can transform the potential of the cotton sector to be a force for positive environmental and social change. Retailers, brands, civil society, producers, governments and suppliers are now coming together to reduce the negative environmental and social consequences of cotton production on a scale never seen before.

Better Cotton (be part of something Better)

Better Cotton came to life out of the belief that we can transform this vital sector.

BCI (Better Cotton Initiative) brings together producers, ginners, mills, traders, manufacturers, retailers, brands and civil society organizations in a unique global community committed to developing Better Cotton as a sustainable Mainstream commodity. By helping farmers to grow cotton in a way that reduces stress on the local environment and improves the livelihoods and welfare of farming communities, BCI aims to create long-term change. It is a global approach that provides a solution for the mainstream cotton industry, including both small holders and large scale farmers.

Benefits are delivered to the poorest and at the same time, large producers are helped to develop solutions that enable large scale provision of a new mainstream commodity, Better Cotton. BCI's approach is to work with members and Implementing partners to enable the supply of Better Cotton and stimulate market demand. Success is measured by both the positive change created at field level and the use of Better Cotton on a global scale. Growing Better Cotton means initially meeting a set of minimum requirements including pesticide use, water conservation, habitat protection, fiber quality and decent work principles.. Once the minimum criteria are met, farmers need to show continuous improvement to remain qualified.

The Better Cotton Initiative (BCI) is a not-for-profit organisation stewarding the global standards for Better Cotton, and bringing together cotton's complex supply chain, from the farmers to the retailers.

"BCI exists to make global cotton production better for the people who produce it, better for the environment it grows in and better for the sector's future, by developing Better Cotton as a sustainable mainstream commodity."

Improve...

livelihoods and economic development in cotton producing areas

Increase...

commitment to and flow of Better Cotton throughout the supply chain

Reduce...

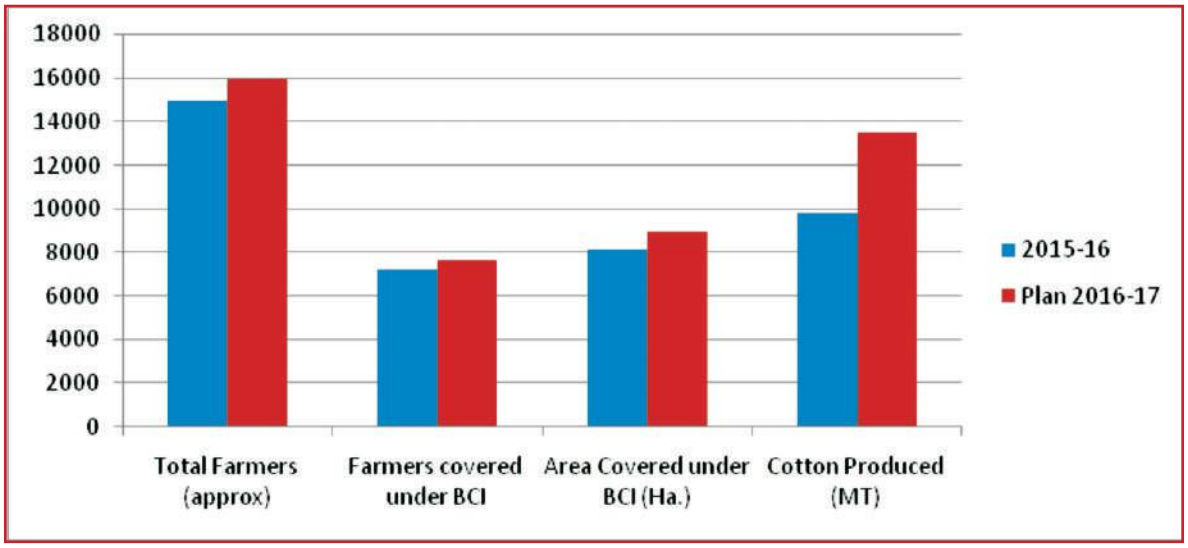
The environmental impact of cotton production

Ensure...

the credibility and sustainability of the Better Cotton Initiative

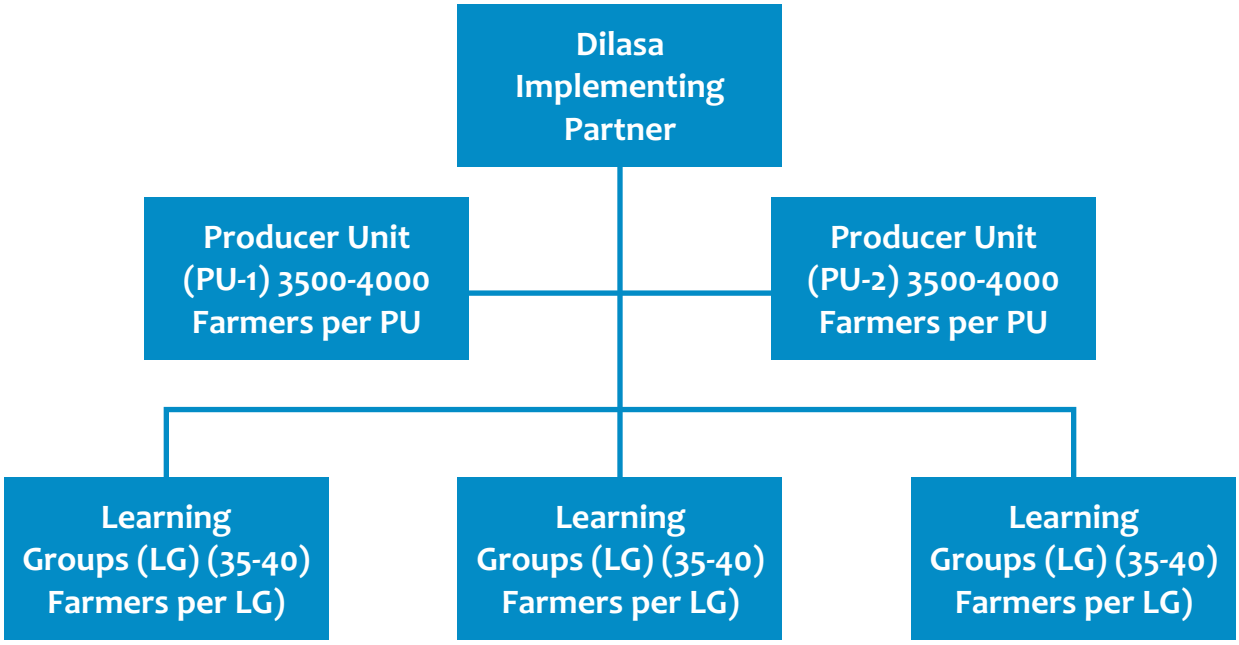
Dilasa's Journey of BCI

Dilasa Janvikas Prathisthan has started to work for cotton from 2010 with sustainable cotton production in 19 villages with 1351 cotton growing farmers from Gangapur & Aurangabad blocks of Aurangabad district. From 2011, these 1351 farmers have been linked with BCI programme and all these farmers achieved minimum requirements of BCI principles for continuous five years of period i.e. up to 2015. Looking to the success of programme and adoptability of interventions, Dilasa has decided to scale up the programme from 1351 farmers to 7223 farmers in 2015-16 in Phulambri & kannad blocks of Aurangabad, Majalegaon block of Beed district and Pathri block of Parbhani district and which will be again expanded in 2016-17 as mentioned below:



Dilasa gas worked on following BCI Principles

Process adopted



Interventions completed

For above principles, Dilasa has worked on capacity building of farmers through different interventions as mentioned below:

Trainings

Three major trainings to cotton growing farmers were being organized at three different critical stages of cotton crop. Following are the training wise details:

First Training

Subject: BCI System, Production principles, INM & Child Labour:

The LG training was completed in the month of may- June before sowing. During these trainings, an LG member has been trained for BCI system, Production principles and MPC's of Soil health and child labour. Under soil health, more emphasis was on integrated Nutrient management as per nutrient status in the area.

The detail schedule of the day has been explained to all participants. First session on developing understanding for BC system was conducted by experts. Training was started with basic for starting BCI project. Why the better cotton is selected- for farmers benefit, for environmental balance and for future benefits & sustainability in cotton cultivation. Farmers are also explained about the benefits of BCI, to whom we called BCI farmer, the production principles including crop protection practices, water management, soil management, natural habitat, fiber quality and decent work minimum production criteria for producing bettor cotton.

How the producer unit is formed. What is the responsibility of farmers in farm assessment? In second presentation he explains the verification process and qualification of BC. It includes farm assessment, what is mean by farm assessment, how it is done and when. What are the responsibilities of farmers, learning group and producer unit in farm assessment. What is mean by credibility check (second party and third party) decision making process on selling Better Cotton, which is the element of supply chain, Data Collection and Data flow, how the data is managed, timeline for BCI.

Second session was conducted on integrated nutrient management. Started with importance of soil testing as well as how the soil sample is collected and methods of testing, nutrient present in soil, their quantity present in soil and its importance. Which are the important elements and their classification? The sources of essential elements (from air, soil and water).as well as the importance of NPK, types of fertilizer including organic, inorganic and bio fertilizer and the methods of fertilizers application. Then he explained the importance of drip irrigation, application of water soluble fertilizer though drips, the soil management

practices for maintaining and enhancing the structure and fertility of the soil, as well as use of fertilizer requirement as per the irrigated or rainfed plant population. LG members are enthusiastic while desiccation they ask so many questions like which are the water soluble fertilizer, quantity of water soluble fertilizer (fertilizer through drip), importance of seed treatment why it is done, and procedure for seed treatment.

Third session on Child Labour is being conducted. The definition of child and Legal definition of child in India as well as our definition of labour, Legal definition of Child Labour by ILO. Farmers explained about the term “child labour” its effects such as mentally, physically, socially or morally which are dangerous and harmful to children. Effects of child labour on children, society and on Nation. Which are the rules and provision in Indian law for child labour? At last Group Discussion was done among participants. All the members of LG group were satisfied with the discussion done and thanking us for valuable information. The training session was wrapped up with feedback from all participants.

Second Training:

Subject : Integrated Pest Management (IPM), Health & safety

IPM training was conducted in the month of August. During these training LG Member has been trained for Integrated Pest Management. Now they can identify Insects & Predator which affect the crop development & the chemical use for crop protection which effects adversely on our health.

Topics of Training:

- Integrated Pest Management in cotton cultivation
- Identification of pest and predators
- Pest scouting and decision making
- Health and safety issues during spraying
- Adverse impact of child labour in cotton

1) Integrated Pest Management in cotton cultivation

The role and importance of the integrated pest management

In integrated pest management farmers are being informed for different practices adopted for pest control and use of chemical those are registered nationally and correctly labeled national language not use banned pesticide. Other IPM practices like use first two spraying of neem-ark, in early stage using trap crop like Marigold, sunflower, Cowpea, Non BT etc such trapping crop reduce the attack of pest on main crop. They attract pest and other use Pheroman trap, yellow sticky trap for pest control which helpful for increase the yield.

2) Identification of Pest & Predator

Proper identification of pest and predator is very important and crucial as use and quantity of recommended pesticides depends on it. In this context, farmers are aware about the major pest and predators through pictures. The beneficial and harmful pests are clearly demonstrated during the training. Under this topic, doses and period of pesticide application is also explained. Relevant training materials are also being circulated to each participant.

3) Health & Safety issues during spraying

Person involved in pesticide application should be healthy, trained about spraying, person who is older than 18 years and not pregnant or nursing women present. While spraying, use mask, hand gloves and other safety equipments. Spraying should be conducted in proper weather conditions.

Third Training:

Subject: Water management & post harvest management

The LG training was completed in the month of October when there is need of critical irrigation and

before harvesting of cotton. During these trainings, an LG member has been trained for Water Management & cotton picking. The detail schedule of the day has been explained to all participants. Training was started with basic for starting BCI project. Why the better cotton is selected- for farmers benefit, for environmental balance and for future benefits & sustainability in cotton cultivation. Farmers are explained about the benefits of BCI, to whom we called BCI farmer, the production principles including crop protection, water management & clean cotton picking

Water is one of the most important inputs essential for the production of crops Water requirement is differ according to crops and soil type Normally a crop has to be irrigated before soil moisture is depleted below 50% of its availability in the root-zone Cotton is a very drought-tolerant plant The cotton plant is drought-adapted and responds favorably to periods of water stress sufficient to slow vegetative growth The water requirement of crops is that quantity of water required by the crops within a given period of time for their maturity Depending on climate and length of the total growing period, cotton needs some 700 to 1300 mm to meet its water requirements (Etm) Evaporation plus the unavoidable losses during the application of water and water required for special operations

Second season is being organized on cotton picking. Farmers explained about how the cotton is being harvested & stored. Only after morning dew drops evaporated, picking should be started. Picking should be done only after at least 50% of the bolls in the field have opened. While picking cotton, laborers should form a line and advance forward together so that they will remain alert and could be well supervised. Start picking from the bottom of the cotton plant to avoid deposition of dry leaf bits on the bolls when the plant shakes. Cotton should be picked from open bolls only. Gather the insect-infested, stained and hard locks as well as locks picked up from the ground in a separate bag, for maintaining purity. Cotton pickers should cover their heads with cloth to prevent cotton being

contaminated with hair. Cotton should be covered with cotton cloth or tarpaulin to avoid soiling of cotton. Tractor trolleys / bullock carts should be cleaned properly before loading of cotton. Trolleys/ bullock carts should be covered from all four sides with cotton cloth or tarpaulin. Storage space for cotton should be clean and dry. If cemented floor is not available, cover the surface with cotton cloth. Cotton heaped in the farm house should be covered with cotton cloth. Cotton pickers should be paid wages on the basis of quality cotton and segregation of different quality cotton. The training session was wrapped up with feedback from all participants and vote of thanks to all resource persons.

Communication materials

At the each training program, different communication materials are use for easy and understandable language to the farmers. For training of master trainers, projector, posters handouts are used. Communication materials such as poster of minimum production criteria's, Integrated Nutrient management, integrated pest management, decent work and the hand outs of the same topics are distributed to the farmers for effective training of LG.

Promotion of low cost & eco-friendly activities in cotton production

Promotion of low cost & eco-friendly activities in cotton production:

Along with capacity building of farmers, Dilasa has promoted following activities to meet out the BCI standards:

ACTIVITIES PLANNED	
S.N.	Activities
1	Deep ploughing and land preparation (30%)
2	Creating awareness about soil testing and actual soil testing distribution of soil test report (20%)
3	Promotion of composting & green manuring (20 %)
4	Promotion of High Density Plant System and motivate farmers to adopt activity (15%)
5	Creating awareness about suitable and early variety selection (40%)
6	Creating awareness and training on seed treatment (20%)
7	Awareness about Refugia/trap crop/Border crop and distribution of seed of trap crops (40%)
8	Training on application of nutrients and fertilizers as per soil test report (45%)
9	Promotion of drip irrigation system & efficient use of water (10%)
10	Installation of birds stands/yellow sticky traps (20%)
11	Training on identification of pests & beneficial insects (65%)
12	Awareness about collection and preparation of Nimboli ark (20%)
13	Awareness on pesticide banned by WHO and under Stockholm & Rotterdam Convention (65%)
14	Training on precautions taken during spraying pesticides (100%)
15	Use of nationally registered, approved and safe pesticides (85%)
16	Identification of pesticides through colored labels on their packages (45%)
17	Pesticide use as per ETL and in recommended concentration only (45%)
18	Safe Handling and disposal of Hazardous Pesticide container (65%)
19	Health & safety for farmers and workers (80%)
20	Training on cotton picking and storage (60%)
21	Prevention of forced and labor in the field (65%)
22	Farmers & women sensitization on non-discrimination issues (70%)

Overall Achievements

During the reporting period, various awareness creation programmes has been conducted in project area. As a result of this, following major outputs have been observed:

- 50% of area covered with micro irrigation systems in old area.
- Application of basal dose is being adopted.
- Use of organic fertilizers is being practicing along with chemical fertilizers.
- Farmers are applying soil test based nutrients.
- Farmers are realising the disadvantages of child labour, therefore they are trying to avoid Childs in field
- 50% of cotton placed in main supply chain

19
Transforming Lives : Centre for Sustainable Livelihood

The Centre for Sustainable Livelihood came into existence as a result of initiative taken by Dilasa Janvikas Pratishthan, an Aurangabad based NGO, which is dedicated to the cause of rural development since past 17 years. Dilasa has come long way from its initial focus in the area of watershed development programmes in Marathwada region of Maharashtra. At recent times, the organization has expanded the scope of its services and is engaged in multiple sectors such as Agriculture development, women development, livelihood enhancement, capacity building programmes and water conservation. It was in this long course of time and with the increasing global demand for skilled personals, Dilasa realized the need of a centre which caters to the needs of development of skills and entrepreneurship qualities of youth and women in the rural areas. Another factor for establishing this centre was the demand for entrepreneurs in village setting to oblige the local requirement of different commodities/ items.

Objectives of the Centre

- To build capacity through systematic trainings in a phased manner with all sections of stakeholders such as youths, women, backward families and senior citizens engaged in livelihood initiatives.
- To organize vocational, entrepreneurship development and management programmes.
- To practise project cycle management and provide strategic institutional support to all interested in the livelihood programmes especially in the regions which are yet to be developed.

- To implement and demonstrate the regional livelihood interventions.
- To create resources through livelihood development activities.
- To provide handhold support to beneficiaries, from the pre-production to the market.

- To develop business plans for livelihood interventions.
- To mobilize credit through financial institutions for livelihood interventions.
- To provide media and communication services to all stakeholders engaged in sustainable livelihood across the spectrum.
- To collaborate with research and technical institutions, along with the market players.
- To conduct applied research on the interventions implemented on regular basis for future livelihood development plans.
- To document successful livelihood interventions highlighting learnings in print and electronic form.
- To provide Library services; virtual knowledge centre fir iff-campus events.
- To encourage / undertake research projects / studies in collaboration with research institutes in the field of sustainable livelihood.
- To provide consultancy services to interested organizations to form consortium to undertake livelihood enhancement programmes.

Interventions of Centre

The major activities undertaken by the centre are-

- Demonstrations of few livelihood interventions.
- Organizing skill development programme.
- Conducting Entrepreneurship Development Programmes (EDP's)
- Preparation of training modules and training notes
- Placement of skilled personals to respective industries.
- Providing handholding support to entrepreneurs during Pre-production, production and post-production stage.
- Documentation of case studies and success stories, books, pamphlets, leaflets, newsletters etc.

20

Concurrent Periodical Impact Monitoring of CNBs in series

Executive Summary

Construction of CNB in series has been a very good programme of State Government which has implemented through Department of Soil Conservation & Water Management in the area like Parner taluka where continuous low rainfall has been measured since last five years. While listing out positive impact of construction of CNB, it has been taken into consideration that construction of CNB is helpful in water conservation if there is some rainfall in the region observed. If we go through recorded rainfall we find that the area received rainfall between 113 mm to 360 mm. Thus low rainfall is the major hurdle faced in getting more positive outcome of the programme. There is much positive impact noticed during the month of July to September 2015 due to water level increased in structures as well as in nearby wells.

Introduction

Effective use of land and water is fundamental to growth and sustainable development. The concept of watershed management has evolved to ensure effective use of both natural and social capitals. Thus

the watershed development programme include land, water and human resources as essential components. The watershed programme is primarily a land based programme, which is increasingly being focused on water, with its main objective being to enhance agricultural productivity through increased in situ moisture conservation and protective irrigation for socio-economic development of rural people.

It is realized that sustainable development is synonymous to maintenance of productivity of natural resources and maintenance of ecological equilibrium The watershed approach is a system-based approach that facilitates the holistic development of agriculture, forestry and allied activities in the proposed watershed. It also forms an appropriate unit for analyzing the development-linked resource problems, designing the appropriate solutions of identified problems and eventually testing the efficacy of the measures taken up.

Development programs, envisaged under its purview include almost every activity which concerns land, water and biomass production. Experiences have shown that watershed as a base is very effective in use and management of land and water resources. With increasing awareness about the problems related to environment, use of watershed terminology is becoming popular and moreover in view of their potential for growth, improvement in income levels and augmenting the natural resources base of the disadvantaged regions of the country.

In 2012-14 to overcome the problem of drought like situation in state of Maharashtra, the department of Water Conservation, Mantralaya, Mumbai, based on survey conducted under the aegis of Ground Water Survey and Development Agency, Pune, in 15 talukas, where ground water level observed below two meter, an important programme had been implemented of constructing Cement Nala Bundh in series. For the said programme provision of budget of 150 crore was made available.

In these 15 taluka by covering 474 villages total 1494 Cement Nala Bandh had been constructed. Rs. 143.40 crores were spent for the programme and handed over to public on 4th June 2013. In this Bundh 22644.61 cubic meter water is impounded by

covering 10303 ha. area under protective irrigation. The govt. of Maharashtra through water conservation department has constructed about 1500 CNBs in 15 taluka of six districts namely Sangali, Satara, Solapur, Pune, Ahmadnagar and Osmanabad. They have become functional from June 2013. It is proposed to have an independent impact monitoring for these CNBs on the basis of certain technical and socio-economic parameters.

As the part of concurrent Impact Evaluation, Dilasa Janvikas Pritisthan, Aurangabad is presenting the final report of construction of Cement Nala Bandh in series in ..... taluka of ..... district. The report covers sample size of 24 villages 72 structures, 284 wells, 360 beneficiaries and 72 non-beneficiaries.

Objectives of the impact evaluation

To assess overall impact of the programme on:

- Ground water level conditions
- Land use pattern, cropping pattern and agriculture productivity in the taluka
- Socio-economic and livelihood conditions of the communities
- Compare impact of CNB in series (before and after project)

Methodology

- Primary data was collected through questionnaires and were filled through personal interaction with farmer beneficiaries/non beneficiary.
- For secondary data taluka agriculture officer, agriculture department & tahsil office (for tanker data), ... were accessed.
- Village wise data analysis has been done and compiled the findings are elaborated chapter-wise.

Rating of Impact

Impact- Assessment parameters were finalized as below:

1. Water Table a. Water level in wells
   b. Period of well drying
   c. Enhancement in no. of wells
2. Crop Intensity/pattern
3. Siltation data
4. Tanker period
5. Change in land value (purchase & Sale)
6. Farmer interaction
   a. Income
   b. Employment

c. Livelihood

Review and Analysis

Compilation of systematic analysis has been done. The major findings based on common measurable and attributable indicators finalized for impact assessment have been listed out chapter-wise.

Impact of Construction of Cement Nalla Bund in Series			
Sr. No.	Particulars	Before Project	After Project
1	Water level in wells	0.80 m	3.8 m
2	Period of well drying	6 months	3 months
3	Enhancement in wells	26 wells	27 new wells
4	Kharif crop area	445.49 ha.	475.08 ha.
5	Rabi crop area	412.69 ha.	649.23 ha.
6	Crop intensity	156.19	171.87
7	Change in land value	3-5 per acre	7-9 per acre
8	Annual Income (average)	54666.67	75666.67
9	Employment (average)	14 days	21 days
10	Labour rate	200 per day	250 per day

- Water availability increased 2 to 4 months
- Dairy with cross bred cow has been adopted majorly.

Note : As evaluation report is property of agency, Dilasa can't disclose the findings

21

Strengthening SHG movement with NabFins

Influenced by the women emancipation movement in 80s, Dr Anagha Patil involved actively in the movement. The iconic personalities like Dr Suniti Pungliya, Dr Vidya Bal, Dr Mrunal Gore, Pramila Dandwate, Dr Patil started the work in Marathwada region in atrocities against women. She remained pioneering in conducting first women's morcha in Aurangabad apart from organizing several conferences. She was also involved actively in resolving the family issues as she is also professor in psychology. However, she realized the fact that accusing the male counterpart for the misdeeds will not be useful to involve the women folk in the mainstream of development. She was always worried about the rural women as they are the most exploited section of the society and no efforts were made to involve them in to the mainstream. The traditional women emancipation movement will not be useful and women emancipation movement should propagate the androgyny concept in which men and women should be considered at equal level. Incidentally, this concept was getting the spontaneous response.

Incidentally, the college gave her an opportunity to conduct the National Service Scheme camp in the Mahalpimpri village, which is merely 10 km away from Aurangabad. She had personally witnessed the woes and agony of the women by visiting many villages and put forth the concept of rural emancipation of women in a different manner.

She always propagates the four prolonged programme for the rural women.

She always propagates the four prolonged programme for the rural women.

1) Emancipation from the hazards of drinking water.
2) Emancipation from the hazards of fuel and fodder.
3) Emancipation from the excess agricultural burden.
4) Emancipation from the economic dependence.

It was a coincidence that, the villagers of Mahalpimpri asked Patil madam to form the organization instead of fighting lonely battle. The villagers suggested the name 'Dilasa' and the organization was registered under Charity Act in 1993. In the initial phase, all the programmes were designed to support the four-point programme. For the emancipation of the hazards of the water, as the region lands in the drought-prone area, Dilasa started the first project of Kachcheghati under Indo Germen Watershed Development Project (IGWDP) which is considered as text book of watershed. Dilasa made the history by implementing the watershed projects in four lakh hectares of land and changed the geography by implementing the project with the concept of ridge to valley and considering the aquifer and its management. The strong base of the organization was built on the concept in which women folk, which is 50% of the population were involved not only in the process but the active implementation. The organization had stressed the need of fuel forest for the women and developed grasses by making

each and every bund lush green. The organization received the 'Vanshree' award for the remarkable plantation. It was also seen that, whenever new technology arrives, it is hijacked by the male counterpart and all the drudgery work is loaded on the women. Even as we have not provided the well-equipped sickle to the women, Dr Patil found that, Konkan Agriculture University developed new sickle which was lessening the burden.

The sickle was given to each and every women and developed agro implements bank on the hire basis for them. The organization is still finding the way as to how new technology can be provided to women to lessen her burden. Because, we could not reduce the burden with the development and the only option is to develop their skills and mechanical aptitude. The organization is basically working on the lines of giving the economic independence to the women by different devices. Dilasa developed more than five thousand Self Help Groups (SHG) under different livelihood activities and it is pertinent to note that, most of the SHGs are still active. The NABARD, various nationalized banks, private financial institutions came forward to help the Dilasa SHGs. The organization developed more than twenty women dairies and SHGs received more than five thousand Osmanabadi goats, as an effective device of the livelihood. After the 3500 farmer suicides in Marathwada region for the last four years, Dr Patil as a chief investigator conducted the extensive survey of the suicide families of NABARD in 2015. Most of the suicides occurred due to the deeply ingrained money lending system at the village level and no farmer can fulfill his family livelihood on the agricultural income. There is a strong need of undertaking additional livelihood activities to each family. Incidentally, Dilasa had initiated these activities by making systematic Livelihood Action Plan (LAP) of every village and undertaken the sub-sector study of every cluster.

During 2015-16, Dilasa developed the compact network of SHGs, especially in Kannad, Sillod and Soygaon blocks of the district. Out of 500 valid SHGs, 266 SHGs were linked with ICICI Bank for credit. However, the NabFins, sister concern of NABARD came forward in a big way to help the women. Actually, Nationalised banks are reluctant to give the loans for SHGs. After the stage of maturity with adequate internal lending, there is a need of sustainable financial assistance. The DGM of NabFins, Mr Chalakh, who is looking after Marathwada region, tried to understand the status of the women SHGs. It is very noteworthy that, NabFins gave the financial assistance of One crore Twenty one lakh to the 32 SHGs. These women established dairy by purchasing cows and buffalos. The dairies of Wasdi, Nimbhora and Karanjkhed have transformed the financial status of women. Even as one SHG member purchased Xerox machine and it is going on well. The loan was utilized to develop the beauty parlour, floor mill, sewing machine, developed the shop let of goldsmith and stationery shop. It is noteworthy that, the recovery of NabFins group and ICICI groups is always 100% and that is a special gesture of Dilasa SHGs.

Balance Sheet

- Funds & Liabilities
- Property & Assets

THE BOMBAY PUBLIC TRUST ACT 1950.

SCHEDULE IX (VIDE RULE 17(1))

NAME OF THE TRUST : - DILASA JANVIKAS PRATISHTHAN

REGISTRATION NO. :- F- 2458 (AURANGABAD)

BALANCE SHEET AS ON 31.03.2016

(Rs. In lakhs)

FUNDS & LIABILITIES		Rs.	PROPERTY & ASSETS	Rs.
TRUST FUND OR CORPUS FUND		48.20	FIXED ASSETS	293.88
SECURED LOANS		601.09	DEPOSITS AND INVESTMENTS	721.50
LIABILITIES, PROVISIONS & ADVANCES FOR EXPENSES		1,201.25	ADVANCES & OTHER RECEIVABLES	605.30
INCOME & EXPENDITURE A/C.		66.53	CASH AND BANK BALANCES	296.39
Surplus as per Last B/s.	64.78			
Add : Surplus during the year	1.76			
TOTAL		1,917.07	TOTAL	1,917.07

above Balance Sheet to the Best of our belief contains a true Account of the Funds and Liabilities and Properties and Assets of the Trust

AS PER OUR REPORT EVEN DATED

FOR DILASA JANVIKAS PRATISHTHAN

FOR SHARMA N. V. & CO.

CHARTERED ACCOUNTANTS

SECRETARY

PLACE :- AURANGABAD

DATE :- 30 / 09 /2016

(N.V.SHARMA)

PROPRIETOR

MEMBERSHIP NO. 31540

THE BOMBAY PUBLIC TRUST ACT 1950.

SCHEDULE IX (VIDE RULE 17(1))

NAME OF THE TRUST : - DILASA JANVIKAS PRATISHTHAN

REGISTRATION NO. :- F- 2458 (AURANGABAD)

INCOME AND EXPENDITURE ACCOUNT FOR THE YEAR ENDED 31ST MARCH 2016

(Rs. In lakhs)

EXPENDITURE	Rs.	INCOME	Rs.
TO ESTABLISHMENT EXPENSES	52.31	BY INCOME FROM OTHER SOURCES	144.28
TO EXPENDITURE ON THE OBJECT OF TRUST	761.01	BY BANK INTEREST	5.60
TO AUDIT FEES	0.80	BY GRANTS	507.11
TO DEPRECIATION	6.53	By GRANT IN AID	165.42
TO EXCESS OF INCOME OVER	1.76		
EXPENDITURE CARRIED TO BALANCE SHEET			
TOTAL	**822.41**	**TOTAL**	**822.41**

FOR DILASA JANVIKAS PRATISHTHAN

SECRETARY

PLACE :- AURANGABAD

DATE :- 30 / 09 /2016

AS PER OUR REPORT EVEN DATED

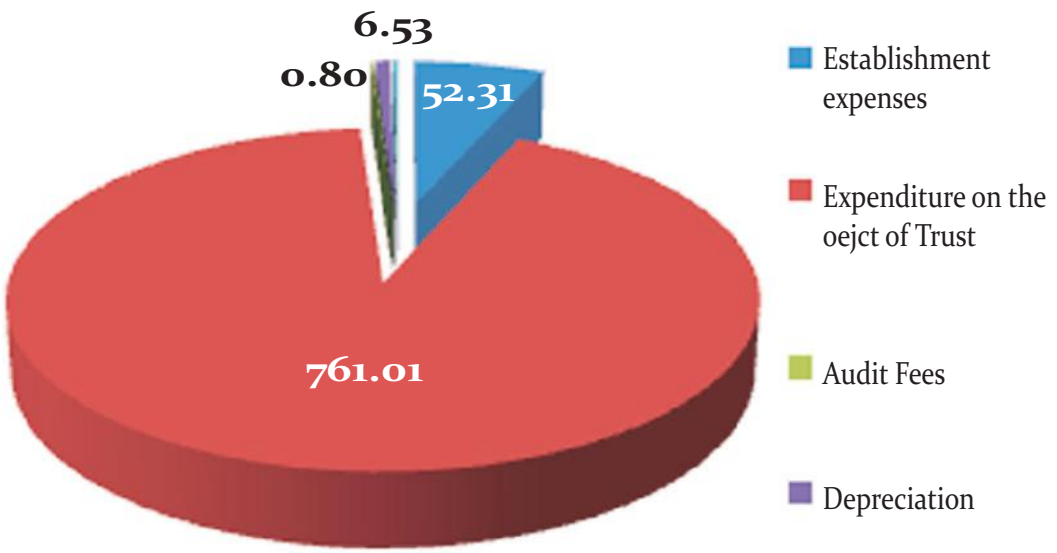
FOR SHARMA N. V. & CO.

CHARTERED ACCOUNTANTS

PROPRIETOR

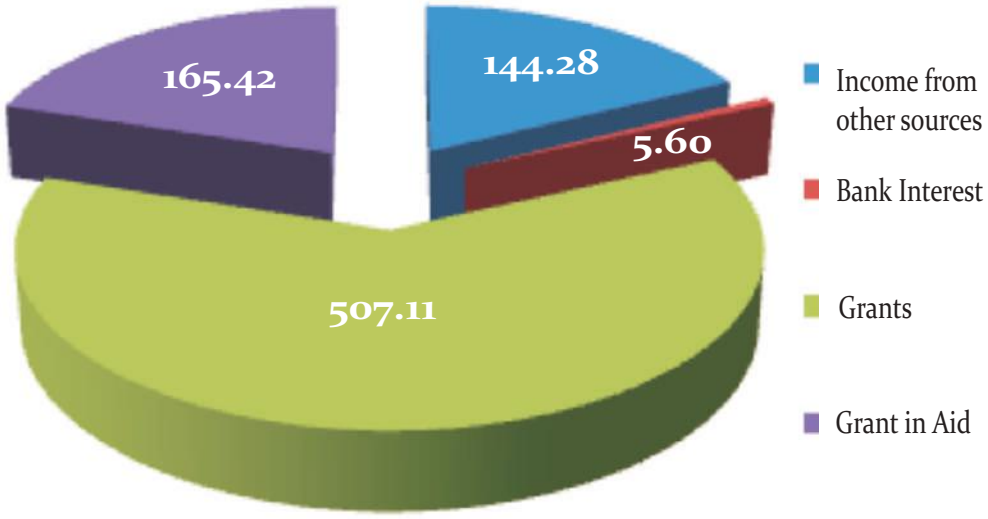
MEMBERSHIP NO. 31540

Income & Expenditure Account (Rs.Lakh)



Total 822.41

Fig. Expenditure



Total 822.41

Fig. Income

Dilasa Janvikas Pratishthan

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