

# Annual Report 2017-18







## Satvik: Promoting Ecological Farming

A 59, Changleshwar Society Mundra Relocation Site Bhuj – Kachchh (370001) Phone: +91 2832 231772

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#### **ABOUT SATVIK...**

Satvik: Promoting Ecological Farming (Satvik) has been promoted by group of motivated organic farmers who came together share their excitement and their practice at the turn of the century later formalized in 2007.

The relatively low and erratic rainfall of arid regions, like Kachchh have challenged the indigenous populations to develop some of the finest crop and animal bio diversities - which have not only reduced risks to adequately feed their human and animals populations, but will in the future, prove to be critical in providing genetic material to face the challenges of climate change. Complex web of loops has been established that feed into one another wherein byproduct becoming primary inputs and the value chain takes place within the eco region. This has created efficiencies, economies and dependencies that promote strong and sustainable communities.

Satvik is reinvesting efforts in scientifically documenting their benefits; promoting their further development; reinstate a confidence and dignity amongst its farmer practitioners - towards self-contained societies and economies that are self-dependent for their food security and only export their surplus.

#### **OBJECTIVE**

To Promote, conceptualize, encourage, aid, organize, assist, support, facilitate, undertake various aspects of ecological farming techniques including distribution, promotion, marketing and trade of such produce, in its all forms, for strengthening of livelihood of marginal farming community and improvement in the health of the people irrespective of caste, class, gender, race and religion.

#### **GOVERNING BOARD**

Sr. No.	Name	Designation
1	Mr. Sukhpal Singh	President
2	Mr. Shailesh Vyas	Secretary
3	Mr. Yogendrasinh Jadeja	Member
4	Mr. Kapil Shah	Member
5	Ms. Sushma lyengar	Member
6	Mr. Sandeep Virmani	Member
7	Mr. Magan Barariya	Member
8	Mr. Mrugesh Trivedi	Member

#### **REGISTRATION**

Society Registration Act, 1860
Bombay Public Trusts Act, 1950
Section 12 AA of Income Tax Act, 1961
Section 80G of Income Tax Act, 1961
Foreign Contribution Regulation Act, 1976
NGO Darpan Registration, 2016

#### STAFF PROFILE

Sr. No.	Name of the Staff	Designation	Education Qualification	Relevant Work Experience
1	Mr. Shailesh Vyas	Secretary and Trustee	B. Sc. (Agri.), PGD Ecology & Environment, MA (Economics)	24 Years
2	Mr. Ramesh Makavana	Sector Coordinator	B. Sc. (Agriculture)	12 Years
3	Mr. Suleman Khoja	Field Assistant	S. S. C.	10 Years
4	Mr. Valimamad Theba	Field Assistant	8 th. Pass	10 Years
5	Ms. Tanvi Baxi	Accountant	B. Com.	09 Years

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#### 1. Conservation of Traditional Seeds: Anmol

#### 1.1 Development of Clusters

For the implementation of Anmol program, following clusters have been developed. The detail is given bellow in table no. 1.1.

Table No. 1.1: Clusters

Sr. No.	Name of Cluster	
1	Adesar Cluster, Taluka:Rapar	
2	Bhimasar Cluster, Taluka:Anjar	
3	Mandavi Cluster, Taluka:Mandavi	
4	Naliya Cluster, Taluka:Abdasa	
5	Kothara Cluster, Taluka:Abdasa	
6	Mokarsiwandh Cluster, Taluka:Abdasa	

#### 1.2 Procurement of mother seed from seed breeder farmers for further seed production

Traditional mother seed was procured from seed breeder farmers for carry out further seed production in Kharif 2017. Cluster Bean and Green Gram seeds were provided for seed production purpose and other crop's seeds were provided for promotional purpose only. The detail is given bellow in table no. 1.2.

Table No. 1.2: Mother Seed Procurement from Seed Breeder Farmers

Sr. No.	Name of Seed Breeder Farmers	Crop	Quantity(Kg)
1	Pachanbhai Chaudhari	Sorghum	500
2	Jentibhai Patel	Cluster Bean	250
3	Bhachubhai Gami	Bajra	100
4	Bhachubhai Gami	Sorghum	25
5	Karmanbhai Marwada	Sesame - Chhhakkad	30
6	Khimjibhai Menat	Green Gram	123
		Total	1028

This procured seeds were cleaned and packed in proper size bags for distribute to seed producer farmers. Packing detail is as below in table no. 1.3

Table No. 1.3: Mother Seed Packing Detail

Name of Seed	Packing Size(Kg)
Sorghum	10
Cluster Bean	05
Green Gram	05
Sesame	01
Castor	05

#### 1.3 Seed production planning

Quality seed production is a major activity of this program; seed production planning was carries out with seed producer farmers. The detail is given bellow in table no. 1.4

Table No. 1.4: Seed Production Planning Plots

	Sr. NO	Name of Cluster	Farmers Enrolled (No.)	Villages Covered (No.)	Cluster Bean (No. of Plots)	Green Gram (No. of Plots)	Crop Area (Ac)	Seed Supplied Qty.(Kg)
Ì	1	Mokarsiwandh - Abdasa	07	04	04	04	15	50
	2	Adesar - Rapar	06	03	06	02	11.50	50
	3	Kothara - Abdasa	07	03	07	02	18	50
	4	Lodai - Bhuj	15	02	09	80	73.50	79
	5	Bhimasar - Anjar	06	03	05	01	25	50
	6	Naliya - Abdasa	06	04	06	01	09	50
		Total	47	19	37	18	152	329

This was planning but due to flood caused by heavy rain in major area of seed production; almost 50% seed production plots were damaged and 29% plots were failure permanently. Among those below table no. 1.5 represents success seed production plots.

Table No. 1.5: Success Seed Production Plots

Sr. No.	Name of Cluster	Cluster Bean - Success Plots (Nos.)	Green Gram - Success Plots (Nos.)
1	Mokarsiwandh - Abdasa	01	00
2	Adesar - Rapar	06	02
3	Kothara - Abdasa	03	01
4	Lodai - Bhuj	08	08
5	Bhimasar - Anjar	05	01
6	Naliya - Abdasa	03	01
Total		26	13

#### 1.4 Training of Seed Producer Farmers on Seed Production Technology

Seed production is a very technical job; imparted training on seed production technology to farmers for maintains purity and quality of seeds. In that training farmers were educated on land preparation, sowing distance, isolation distance and crop management practices. 55 seed producer farmers had participated.

On field training on roughing (removal of off type plants from seed production plot) were provided to each and every seed producer farmers whose plot was survived.

#### 1.5 Seed Production Site Verification Visit

Seed production plots have requires good soil, nearby to easy access and protect from animal damage. All seed producer farmers have instructed to select farm accordingly. All seed production farms were visited after sowing for verification purpose. Some farms were not easily accessible but due to soil conveniences approved for seed production. Farm map, farm photographs and GPS locations were taken up for documentation purpose.

#### 1.6 Desi Seed Promotion Demonstrations

Distributed traditional seeds to farmers for creating awareness; it was about suitability and production in changing climatic condition. Traditional seeds of Sorghum, Sesame, Castor and Moth Bean were distributed for sowing. The detail is given bellow in table no. 1.6.

Table No. 1.6: Seed Promotion Demonstrations

Sr. No.	Crop	No. of Farmers Benefited	Seed Distributed Qty. (Kg)
1	Sorghum	27	300
2	Sesame	40	45
3	Castor	08	53
4	Moth Bean	09	75
	Total	84	473

Feedback from these farmers was recorded. Farmers were happy with traditional seeds and they will sow these seeds in next coming years.

#### 1.7 Monitoring Visits of Seed Production Plots

Satvik was visiting all seed production plots every 15 days. Seed producer farmers were advised for nutrient management, crop protection measures and roughing during visits. Satvik team had visited 8 times each seed production plot. These visits have built strong confidence among farmers and relationship with farmers.

#### 1.8 Seed Approval Committee visit

Seed produced by seed producer farmers was monitored by team Satvik. To make farmers sure for quality and integrity; seed approval committee was formed. This committee comprises 2 farmer members and 3 expert members. The detail is given bellow in table no. 1.7.

Table No. 1.7: Seed Approval Committee

Sr. No.	Name of Member	Represents
1	Shri Maganbhai Ahir	Farmer
2	Shri Pravinbhai Dangar	Farmer
3	Shri Jayeshbhai Lalka	Expert Member
4	Shri Tejabhai Chaudhari	Expert Member
5	Shri Rameshbhai Makavana	Expert Member

It is decided that seed approval committee will visit twice every plot for check quality of seed. But in kharif 2017 season, seed approval committee had visited each and every seed production plot during crop maturity stage i.e. before harvesting. Second visit was not made possible due to first visit was too late. According to members of committee one visit was sufficient to judge quality of seed in standing crop. And they had suggested that second visit should be carried out after threshing to check physical quality of seed and then procurement should be done. During their visit many seed production plots were rejected because of roughing was not done satisfactory. Seed approval committee had recommended farmer list for procurement. Rejected farmers were intimated to sale their produce in open market and Rs. 1000 per acre was paid as a seed promotional activity.

#### 1.9 Seed Procurement

Seed procurement was carried out based on seed approval committee's recommendation. As per their advice second visit for physical quality check was carried out. Some farmers were rejected during second visit because of inferior quality seeds. Seed procurement price and premium was decided in initial meetings. It was decided that procurement price will be weekly average of maximum price reported in Kutch Mitra Daily Newspaper of Bhuj, Anjar, Bhachau and Rapar APMCs. Every week new procurement price will be declared. A fix 20% premium was decided for appropriate quality seeds. Procurement detail is given in below table no. 1.8.

Table No. 1.8: Seed procurement detail

Name of Crop	No. of Farmers	Total Procured (Kg)
Cluster Bean	07	1766
Green Gram	04	587
Total	11	2353

#### 1.10 Seed Cleaning, Grading, Packaging

Seed procured from seed producer farmers was farmer grade. To convert it in to seed quality; cleaning, grading and packaging unit was identified near Bhuj. This processing unit is run by Mr. Devji Velji Bhuva in village Sukhpar. All procured material was processed in 3 days. After processing of material, it was divided in to three grades like A, B and waste. A - grade is final product, B- grade can be used for promotional purpose only and waste is discarded. Packaging, labeling and lot numbers were given at that time. Processed seeds are packed in to fresh gunny bags a 50 kg unit. Processing and recovery detail is provided below in table no. 1.9.

Table No. 1.9: Seed Processing Detail

Particulars	Cluster Bean	Green Gram
Total Seed Procured (Kg)	1766.4	587
Total A Grade Recovery (Kg)	1281.48	538
Total B Grade Recovery (Kg)	311	000
Recovery A Grade (%)	73	92

#### 1.11 Seed Storage

Protect seeds from storage pest and viability issue; seeds have been stored in Arham Cold Storage near Bhuj. Total 41 bags 50 kg each (i.e. Cluster Bean - A and B Grade + Green Gram – A Grade) have been put in to cold storage till next sowing season. The initial idea was to store seeds at cluster level seed centers but this decision was made based on past experience to store seed in air tight bags and drums. Seeds were heavily damaged by storage pests and germination was drastically reduced. Seeds will be issued from cold storage just before Kharif 2018 for distribute to farmers.

#### 1.12 Farmer day Celebration cum Exposure Visit

Farmer day cum farmer exposure visit was celebrated on 21st September 2017 at traditional seed RBD experiment plot, Mandavi and Naliya. The main objective was to participatory variety selection among different traditional varieties. Another objective was to compare traditional seed with local release variety. 60 Farmers had participated. In the beginning farmers were oriented about the event and objectives of conducting experiment plots. Farmers were visited experiment plot and observed different traditional varieties, its characteristics, compared with release variety and discussed a lot about pros and cons of different varieties. Based on farmer's observations, following response was received from farmers (Table no. 1.10). Farmers were very happy and enjoyed a lot the full day.

Table No. 1.10: Choice by Farmers

Crop	First Choice	Second Choice
Cluster Bean	103 (SBF - Jentibhai Patel)	102 (SBF – Gaurishankar Vyas)
Green Gram	106 (Gujarat Mag -4)	101 (SBF – Bhachubhai Gami)
Sorghum	103 (SBF - Bhachubhai Gami)	104 (SBF – Bharatbhai Boda)

#### 1.13 Summer Seed Productions

Seed production in Kharif season was drastically low as compare to estimation. It was decided that seed production should be target in summer season to meet production demand. For that purpose, 4 – 5 farmers from Sangamner village were identified. Initial meeting was held with them and oriented about project activity. All farmers were agreed to undertake seed production of Cluster Bean under irrigation condition in summer season. Seed production training was provided them and 150 kg mother seed was made available to them. Finally, four farmers had sown Cluster Bean in 20 acres. Satvik was monitoring seed production plots on regular basis.

#### 1.14 Development of Collaboration with Excel Genetics

Excel Genetics is a reputed seed company of Excel group. Shri Dipeshbhai Shrof is one of key member of this Company's management. He and Smt Pritiben Shrof are running agro base industries. Satvik's one of Trustee Shri Sandeephai Virmani had talked them about Satvik's traditional seed program. They were very excited to support this program anyway. The first meeting was held at Satvik office with Shri Deepeshbhai and Smt Pritiben. Shri Sandeephai Virmani, Shri Shaileshbhai Vyas and Shri Rameshbhai Makvana had participated in this meeting. After detail discussion on Satvik's work on seed and future plan; Shri Deepeshbhai Shrof had said that Satvik must have meeting with officials of Excel Genetics. He added that he

will call a meeting. Second meeting was organized at Pranav Farm and with same participants and finalized that Excel Genetics will engage with Satvik for variety identification and further linkages. Third meeting was held at Satvik office with Shri Abhaybhai Saraiya form Excel Genetics and Dr. C P Singh from Agrocel Industries. In this meeting Shri Sandeepbhai Virmani, Shri Shaileshbhai Vyas and Shri Rameshbhai Makavana had participated. Satvik had shared technical data of seed experiments conducted by Satvik. Shri Abhaybhai had responded that this is ok but Excel Genetics would like to observe on field performance of traditional varieties. Dr. C P Singh had recommended conducting multi-location varietal trial. He had suggested RBD field experiment trial design and added that this should be plan at different agro-climatic zones of Kachchh. Based on these meetings and discussions; Satvik had conducted RBD experiment plots at 4 locations. One experiment plot was failure due to flood situation in Lodai cluster. Location detail and selection of seed varieties is provided in table no. 1.11 & 1.12.

Table No. 1.11: Locations of Experiment Plot

Location	Village	Zone
Kodaki Farm	Kodaki	Bhuj
VRTI - Campus	Mandavi	Mandavi
VRTI - Campus	Naliya	Abdasa
Khengarpar	Khengarpar	Western Bhuj

Table No. 1.12: Seed Varieties Selected for Experiment

Crop	Variety	Code No.	Spacing	Replication
Cluster Bean	Jesa Petha Chhanga	CB 101	10 R X 10 Mtr	03
Cluster Bean	Gaurishankar Vyas	CB 102	10 R X 10 Mtr	03
Cluster Bean	Jentibhai Patel	CB 103	10 R X 10 Mtr	03
Cluster Bean	Gujarat Guwar 1 – Check	CB 104	10 R X 10 Mtr	03
Green Gram	Bhachu Dharamsi Gami	GG 101	10 R X 10 Mtr	03
Green Gram	Jesa Petha Chhanga	GG 102	10 R X 10 Mtr	03
Green Gram	Miya Husen Mamad	GG 103	10 R X 10 Mtr	03
Green Gram	Pachan Hari Chaudhari	GG 104	10 R X 10 Mtr	03
Green Gram	Khimjibhai Menat	GG 105	10 R X 10 Mtr	03
Green Gram	Gujarat Mag 4 – Check	GG 106	10 R X 10 Mtr	03
Sorghum	Pachan Hari Chaudhari	SG 101	10 R X 10 Mtr	03
Sorghum	Amra Hari Parmar	SG 102	10 R X 10 Mtr	03
Sorghum	Bharat Damji Boda	SG 104	10 R X 10 Mtr	03
Sorghum	Bhachu Dharamsi Gami	SG 103	10 R X 10 Mtr	03
Sorghum	Local Gundari – Check	SG 105	10 R X 10 Mtr	03

Satvik staff was regularly monitoring and documenting observations. Dr. C P Singh had visited Mandavi and Kodaki plots. He had documented their observations and shared by mail with Satvik. His observations and suggestions are as below:

#### Cluster bean:

- Two types of trial entries-
  - Branching types which are late in duration, till now only 2-5 % flowering
  - Erect types which are early genotypes, 25-30% flowering completed. We can't compare between both plants types.

- Whitefly attack is common on both location and its depend on entries foliage.
- Branching types entries will in full bloom in Oct, I will observe next in Nov and give my final suggestion (also see the grain size & colour).
- All entries have mixed seed and requires purity, Government variety (check variety) have poorest quality seed.

#### Suggestion:

At this stage Entry 103 looks better in managed plot (poor in drought), present farmer's preference is early mature genotypes and we can place Entry 103 in market. But it requires proper positioning and seed purity. Need to do single plant selection and multiply seed. Avoid sale in area where have early drought, virus and aphid severity. For the best yield it needs to control whitefly.

#### Moong bean:

Gujarat -4 is only determinate type, rest all locals' cultivar are late in maturity. Here selection will have finalized after Nov -17 visits only. Experiment plots were harvested separately and data has been shared with Shri Abhaybhai and DR CP Singh for their feedback. Compiled for analyses is provided in table no. 1.13, 1.14 & 1.15.

Table No. 1.13: RBD Experiment Plot Data – Cluster Bean

Line No.	Mandavi	Mandavi	Mandavi R 1	Mandavi	Mandavi	Mandavi	Mandavi	Mandavi	Mandavi	Naliya R	Naliya R	Naliya R	Naliya R	Naliya R	Naliya R	Naliya R	Naliya R	Naliya R	Kodaki R	Kodaki R	Kodaki R	Kodaki R	Kodaki R	Kodaki R 2 -	Kodaki R	Kodaki R	Kodaki R 3 -
	R1 - No.	R1-	-	R 2 - No.	R 2 -	R 2 -	R 3 - No.	R3-	R3-	1 - No. of	1-	1-	2 - No. of	2 -	2 -	3 - No. of	3 -	3 -	1 - No. of	1-	1-	2 - No. of	2 -		3 - No. of	3 -	Production/1
	of Plants	Productio	Production/1	of Plants	Productio	Productio	of Plants	Productio	Productio	Plants	Productio	Productio	Plants	Productio	Productio	Plants	Productio	Productio	Plants	Productio	Productio	Plants	Productio	Production/	Plants	Productio	000 Plant
		n (Kg.)	000 Plant		n (Kg.)	n/1000		n (Kg.)	n/1000		n (Kg.)	n/1000		n (Kg.)	n/1000		n (Kg.)	n/1000		n (Kg.)	n/1000		n (Kg.)	1000 Plant		n (Kg.)	(Kg)
			(Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			(Kg)			
101	342	2.30	6.73	560	5.72	10.21	519	5.48	10.56	90	2.36	26.22	346	3.26	9.42	389	2.9	7.5	320	0.94	2.94	292	0.96	3.29	414	2.54	6.14
102	412	3.76	9.13	429	6.50	15.15	519	5.22	10.06	141	3.77	26.74	300	3.87	12.90	470	3.1	6.5	318	1.05	3.30	327	1.22	3.73	336	1.22	3.63
103	456	3.40	7.46	512	6.32	12.34	567	7.52	13.26	131	4.18	31.91	451	2.97	6.59	419	2.1	5.0	412	0.61	1.48	362	1.01	2.79	342	0.80	2.34
104	470	2.94	6.26	570	5.54	9.72	418	4.18	10.00	218	4.90	22.48	327	3.33	10.18	428	2.0	4.6	446	1.60	3.59	412	2.34	5.68	428	3.54	8.27
101	102	103	104																								
26.46	29.68	28.92	30.35	i																							

Table No. 1.14: RBD Experiment Plot Data – Green Gram

			Mandavi R 1								Naliya R													Kodaki R 2 -			
	R 1 - No.			R 2 - No.			R 3 - No.			1 - No. of	1-		2 - No. of			3 - No. of			1 - No. of			2 - No. of			3 - No. of		Production/:
	of Plants		Production/1	of Plants			of Plants			Plants		Productio	Plants	Productio		Plants		Productio	Plants		Productio	Plants		Production/	Plants	Productio	
		n (Kg.)	000 Plant			n/1000		n (Kg.)	n/1000			n/1000			n/1000			n/1000		n (Kg.)	n/1000		n (Kg.)	1000 Plant		n (Kg.)	(Kg)
			(Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			Plant (Kg)			(Kg)			
101	376	4.28	11.38	247	1.58	6.40	Not Sow		Not Sow	246	4.92	20.00	410	5.59	13.63	110	2.93	26.64	397	1.61	4.06	378	1.70	4.50	398	1.52	3.82
102	345	2.40	6.96	Not Sow	Not Sow	Not Sow	Not Sow	Not Sow	Not Sow	860	3.21	3.73	Not Sow	Not Sow	Not Sow	170	2.42	14.24	412	1.07	2.60	410	1.17	2.85	438	1.57	3.58
103	260	1.30	5.00	256	1.88	7.34	465	4.84	10.41	625	4.75	7.60	820	4.48	5.46	6	0.63	105.00	437	1.48	3.39	417	0.92	2.21	458	1.06	2.31
104	348	1.50	4.31	Not Sow	Not Sow	Not Sow	402	2.62	6.52	Not Sow	Not Sow	Not Sow	Not Sow	Not Sow	Not Sow	522	4.48	8.58	375	1.52	4.05	438	1.24	2.83	416	1.83	4.40
105	Not Sow	Not Sow	Not Sow	289	1.56	5.40	452	2.56	5.66	160	2.04	12.75	530	4.10	7.74	310	4.02	12.97	414	1.27	3.07	423	1.24	2.93	428	1.25	2.92
106	Not Sow	Not Sow	Not Sow	324	2.80	8.64	416	6.10	14.66	60	0.12	2.00	430	0.90	2.09	350	1.28	3.66	328	1.14	3.48	416	1.66	3.99	317	1.85	5.84
101	24.13																										
102	11.84																										
103	21.34	ĺ																									

Table No. 1.15: RBD Experiment Plot Data – Sorghum

	R 1 - No. of Plants	R 1 - Dry Fodder	Mandavi R 1 Dry Fodder Production/1 000 Plant (Kg)	R 2 - No. of Plants	R 2 - Dry Fodder Productio n (Kg.)	R 2 - Dry	R 3 - No. of Plants	R 3 - Dry Fodder Productio n (Kg.)	R 3 - Dry Fodder Productio	- No. of Plants	- Dry Fodder Productio n (Kg.)	Naliya R 1 - Dry Fodder Productio n/1000 Plant (Kg)	- No. of Plants	- Dry Fodder Productio n (Kg.)	- Dry Fodder	- No. of Plants	- Dry Fodder Productio n (Kg.)		1 - No. of Plants	1 - Dry Fodder Productio n (Kg.)		2 - No. of Plants	2 - Dry Fodder	Dry Fodder Production/ 1000 Plant	3 - No. of Plants	3 - Dry	Kodaki R 3 - Dry Fodder Production/1 000 Plant (Kg)
101	428	29.30	68.46	472	32.10	68.01	388	27.20	70.10	374	25.50	68.18	450	53.20	118.22	442	50.50	114.25	98	3.33	33.98	235	4.80	20.43	122	8.02	65.74
102	244	9.70	39.75	236	17.80	75.42	242	18.88	78.02	243	32.30	132.92	316	37.50	118.67	458	64.50	140.83	101	4.32	42.77	233	6.20	26.61	204	3.60	17.65
103	418	38.32	91.67	512	37.40	73.05	566	51.58	91.13	407	48.60	119.41	463	81.40	175.81	413	44.20	107.02	112	4.12	36.79	85	5.50	64.71	172	6.20	36.05
104	497	42.30	85.11	422	42.40	100.47	519	49.78	95.92	397	51.70	130.23	452	61.80	136.73	419	41.10	98.09	152	5.60	36.84	213	8.40	39.44	268	11.20	41.79
105	487	27.84	57.17	562	53.38	94.98	538	52.74	98.03	423	48.20	113.95	436	65.40	150.00	438	68.70	156.85	176	4.04	22.95	265	8.90	33.58	286	14.14	49.44

#### 1.15 Genetic bar coding of Cluster Bean and Green Gram

Many improved varieties of Cluster Bean and Green Gram were released by Government/Private sector. Sometimes farmers are confused between Desi and Improved variety because of similarity in morphological characters. Some farmers understand that year by year sowing of improved variety became Desi after 10 to 15 years. For that purpose, it is

decided to carry out genetic bar coding of selected desi varieties of Cluster Bean and Green Gram along with one improved release variety. Bar coding laboratory has been identified and stared coordination with laboratory. Laboratory had asked to submit fresh plant samples for genetic bar coding. Plants are being grow on Maganbhai's farm; these will be submitted when get ready to submit.

#### 1.16 Farmer Benefit Study and Survey

Satvik had out sourced farmer benefit study to Parab a third party. As this was first year; primarily Desi seed use feedback was asked to farmers. This study was carried out in 29 villages of 7 talukas and 216 farmers were contacted. Farmer's choice and inclination was clearly expressed by this study. We can see the farmer's like and dislike in the table no. 1.16.

Table No. 1.16: Desi Seed Use Responses by Farmers

Crop	Like	Dislike	Total Review
Sorghum	91	15	106
Castor	06	00	07
Cluster Bean	36	2	38
Green Ggram	13	05	18
Moth Bean	10	00	10
Sesame	29	07	36
Total	185	29	215

Another survey was carried out to map out main source of seed today. The objective was to know crop wise need of seed, demand of desi seed and percent penetration of modern seed. This survey was carried out by Parab team on behalf of Satvik. This survey had covered 70 villages from 9 Talukas and 348 farmers in Kachchh district only. Analyses are still pending but primary data shows that very interesting figures come out from this survey. Some facts of this survey are depicted in table no. 1.17 & 1.18.

Table No. 1.17: Seed Source Detail in Rain fed

Sr.No	Crop								RAINFED							
٠		Farmers (No.)	Crop Sown	Seed Sown (Kg)		Farm Saved	l	Purchase I	Loose - Fello	ow Farmer	Purch	ase Loose -	Other	P	urchase-Se	al
			Area (Ac)		No.	Acre	Kg	No.	Acre	Kg	No.	Acre	Kg	No.	Acre	Kg
1	Green Gram	104	504	896	48	295	458	4	12	34	12	45	123	40	152	282
2	Castor	46	316	524	11	99	95	2	18	10	0	0	0	33	199	419
3	Chick Pea	6	22	530	3	14	335	3	8	195	0	0	0	0	0	0
4	Cluster Bean	137	841	3023	98	652	2289	23	118	449	6	32	127	10	39	158
5	Ground Nut	63	497	16985	0	0	0	0	0	0	58	428	14240	5	69	2745
6	Kala Cotton	19	100	461	0	0	0	0	0	0	5	31	160	14	69	301
7	Lucern	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
8	Moth Bean	44	257	296	32	214	231	4	9	20	5	18	25	3	17	20
9	Pearl Millet	34	152	131	9	75	52	0	0	0	2	11	5	23	66	74
-	Sesame - Bhuksa	3	12	5	3	12	5	0	0	0	0	0	0	0	0	0
	Sesame - Black	6	28	24	2	7	8	2	11	11	0	0	0	2	10	5
12	Sesame - White	143	832	899	51	349	301	12	57	95	14	73	62	66	353	442
13	Sorghum	118	634	4546	45	232	1537	25	151	983	46	237	1931	2	15	95

#### Table No. 1.18: Seed Source Detail in Irrigation

Sr.No	Crop				-	1			IRRIGATED							
٠		Farmers (No.)	Crop Sown	Seed Sown (Kg)	100	Farm Saved		Purchase	Loose - Fell	ow Farmer	Purch	ase Loose -	Other	F	Purchase-Se	al
			Area (Ac)		No.	Acre	Kg	No.	Acre	Kg	No.	Acre	Kg	No.	Acre	Kg
1	Green Gram	2	9	22	1	8	18	0	0	0	0	0	0	1	1	4
2	Castor	53	325	677	1	4	8	0	0	0	0	0	0	52	321	669
3	Chick Pea	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4	Cluster Bean	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
5	Ground Nut	46	484	28495	2	22	1760	1	11	880	43	451	25855	0	0	0
6	Kala Cotton	7	34	178	0	0	0	0	0	0	6	30	138	1	4	40
7	Lucern	4	3.5	38	2	2	23	2	1.5	15	0	0	0	0	0	0
8	Moth Bean	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
9	Pearl Millet	7	27	33	0	0	0	0	0	0	0	0	0	7	27	33
10	Sesame - Bhuksa	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
11	Sesame - Black	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
12	Sesame - White	81	472	684	1	12	14	0	0	0	1	4	8	79	456	662
13	Sorghum	10	30	364	6	21	250	3	9	110	0	0	0	1	0.5	4

Farmer benefit study and seed source survey both will be carry out in next season also to compare trend of seed use and farmer's interest.

#### 2. Strengthening Sustainable Agriculture

#### 2.1 Capacity Building

#### 2.1.1 Trainings

Satvik and Shree Ram Krishna Trust jointly organizing short training module on organic farming for the farmers who want to get introduced to organic farming before its adoption, 3 days' trainings were organized for such farmers at Chintan Farm. In this training use of audio visual was emphasized. Archive was surfed and relevant video clips and presentation was shortlisted. The detail is given bellow in table no. 2.1.

Table No. 2.1: Training detail

No. of Trainings	Days of Training	Participants
14	03	547
01	05	42
15	8	589

Satvik is a service provider to the Department of Agriculture for implementation of organic farming policy 2015 and Paramparagat Krishi Vikas Yojana (PKVY) in Kachchh district. Satvik is imparting training to the farmers and offices on organic farming under this scheme. Training detail is as below in table no. 2.2:

Table No. 2.2: Trainings for farmers and officers

No. of Trainings	Category	Days of Training	Participants
04	Farmers	02	180
03	Officers	01	60
07		03	240

#### 3. Networking and Support

#### 3.1 Working with Kutch Navnirman Abhiyan

Satvik is a member of Kutch Navnirman Abhiyan. As a member Sh. Shailesh Vyas has participated in AGM and Governing Board Meetings during the year.

Satvik is working with Revitalizing Rainfed Agriculture Network for policy advocacy for traditional seeds. Satvik had participated in 2-day workshop on seed system organized by RRA Network at Manage, Hyderabad; and presented their work on traditional seeds.

#### 3.2 Participation in Workshops/Seminars/Convention

National chapter on traditional seeds had organized 3-day event on traditional seeds at Nagpur called "Beejostav". Satvik and their partner organization had participated in this event for learn how to showcase traditional seeds and develop relations with them.

#### 4. Financial Reports

#### 4.1 Balance Sheet

#### Satvik: Promoting Ecological Farming

Public Charitable Trust Reg. No. F-1541/Kachchh & Society Reg. No. Guj/1355/Kachchh

#### Balance Sheet as on 31st March 2018

		As on	As on	Total	As on	As on
Particular	Annexure	31-03-2018 - FC	31-03-2018 - NFC	2017-18	31-03-2017 - FC	31-03-2017 - NFC
Funds & Liabilities						
Trust and Corpus Funds	Α		1,721,615	1,721,615		1,699,487
Other Funds	В	447,577	105,862	553,439	258,708	80,126
Unutilized Grant	С	3,515,286		3,515,286	20,001	
Total		3,962,863	1,827,477	5,790,340	278,709	1,779,613
Assets & Properties						
Net Block of Fixed Assets	D		1,477,043	1,477,043		1,450,131
Investments	E	3,901,081	277,746	4,178,827	174,235	260,834
Net Current Assets	F	61,782	72,688	134,470	104,474	68,648
Total		3,962,863	1,827,477	5,790,340	278,709	1,779,613
Notes forming part of Accounts	. 0					

For Satvik: Promoting Ecological Farming 9/

(Shailesh Vyas) Secretary

Place : Bhuj Dated : 0 9 AUG 2018 For H.Rustom & Co. Chartered Accountants Firm Reg. No. : 108908W

(HRD Dalal) Proprietor Membership No. 31368

Place : Ahmedabad Dated : 1 1 AUG 2018

A'BAD-1

For A S Shaikh & Co. Chartered Accountants Firm Reg. No. : 137755W

(Aslam Shaikh) Proprietor Membership No.162345

Place : Ahmedabad

Dated: 11 AUG 2018



#### 4.2 Income and Expenditure

#### Satvik: Promoting Ecological Farming

Public Charitable Trust Reg. No. F-1541/Kachchh & Society Reg. No. Guj/1355/Kachchh

Income & Expenditure Account for the Year Ending on 31.03.2018

Particulars	Annexure	31-03-2018 - FC	31-03-2018 - NFC	Total 2017	31-03-2017 - FC	31-03-2017 - NFC
Income						
Grants & Donations	G	2,339,102	-	2,339,102	311,999	
Other Income	Н	-	165,753	165,753		679,250
Interest Income	1	261,906	25,511	287,417	23,171	27,306
Total		2,601,008	191,264	2,792,272	335,170	706,556
Expenditure						
Expenditure on objects of the trust	J	1,286,972	79,899.00	1,366,871	397,578	727,060
Contribution to Charity Commissioner	K	14,595		14,595		19,497
Establishment Cost	L	1,064,572	20,480.00	1,085,052		7,972
Remuneration to Trustee	M	6,000	-	6,000		
Statutory Audit Fees	N	40,000		40,000		28,750
Depreciation	D		33,274	33,274		7,182
Transfer to Corpus Fund	Α		21,320	21,320	-	19,822
Loss On sales of Asset			10,555	10,555		
Excess of Income over Expenditure	В	188,869	25,736	214,604	(62,408)	(103,727)
Total		2,601,008	191,264	2,792,272	335,170	706,556
Notes Forming Part of Accounts	0					

For Satvik: Promoting co/ **Ecological Farming** 

(Shailesh Vyas) Secretary

Place Bhuj Dated 9 AUG 2018

For H.Rustom & Co. Chartered Accountants Firm Reg. No. : 108908W

(HRD Dalal) Proprietor Membership No. 31368

Place: Ahmedabad Dated:

A'BAD-1

For A S Shaikh & Co. Chartered Accountants Firm Reg. No. : 137755W

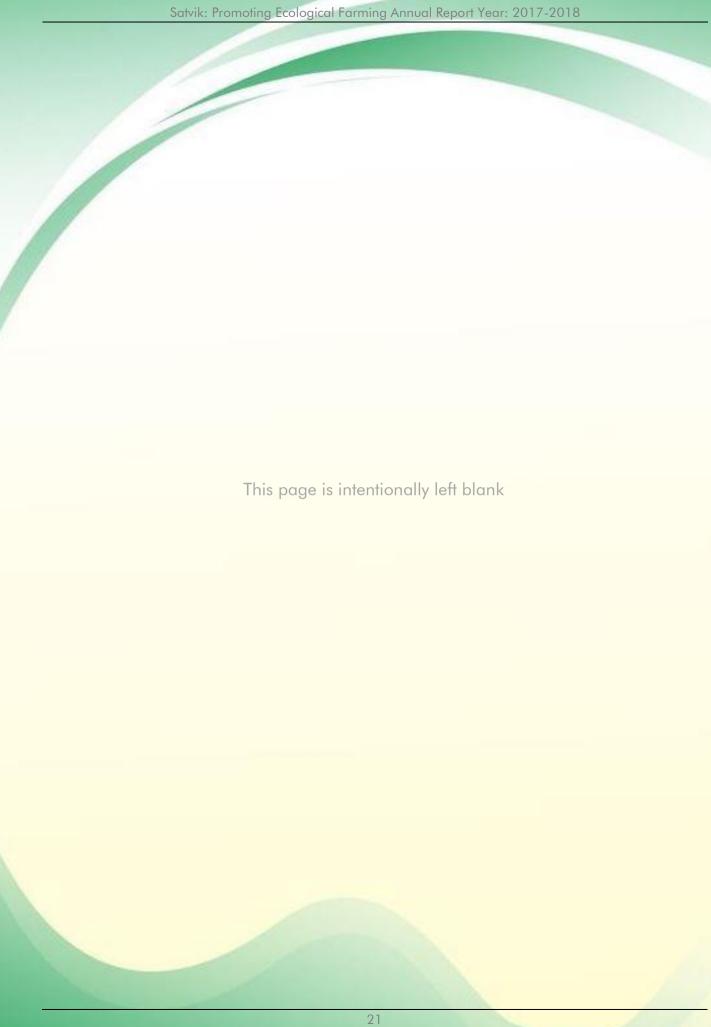
(Aslam Shaikh)

Proprietor Membership No.162345

Place : Ahmedabad

11 AUG 2018

AUG 2018 Dated





















## **Annual Report**

2017-18





### Satvik: Promoting Ecological Farming

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