

# Joint Inspection Team (JIT) Report of Mission for Integrated Development of Horticulture for Tamil Nadu State

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#### Dates of Visit: 30.11.2014 to 06.12.2014

#### **Team Members:**

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- 3. Sh. G Kandasamy, Joint Director (Horticulture), I/C TANHODA, Chennai.
- 4. Sh. S V K Rajendran Joint Director of Horticulture (Micro), TANHODA, Chennai.-

#### **General Observations:**

- 1. Carnation flowers are being raised in polyhouses in Nillgiri district. The farmers are facing difficulty in marketing as these have to be sent to Bangalore. JIT is of the view that farmer groups need to be formed for the purpose.
- 2. Farmers feel that during frost time there is loss to vegetables. To avoid these losses semi portable sprinklers can be given under micro irrigation with well water availability.
- 3. Keeping in view the small farm holdings, polyhouses need to be designed for vegetable production at low or medium cost.
- 4. In polyhouses for Lillium production plastic crates are broken for laying the seedlings in the cocopeat. Instead plastic trays especially designed for the polyhouses may be used.
- 5. Gunny bags are used for transportation of vegetables for marketing. To avoid losses due to transportation, these may be replaced with plastic crates.
- 6. Mulching may be recommended in the places where vegetables are cultivated.
- 7. There is single gate entry in some of the polyhouses. The gate frequently remains open which can lead to pests and diseases attack. JIT suggested double gate entry so that only one gate is opened at a time.
- 8. The Cocoa as an intercrop of Coconut is doing very well and farmers feel satisfied about the production and also, there is no marketing problem .This needs to be encouraged, wherever, space is available for intercrop.
- 9. Apart from the drip irrigation installed through NMMI, the farmers have taken up drip irrigation at their own expense in some areas. In view of its advantages of higher yield and water conservation, there is a need to organize some awareness programmes in different areas.

#### State-Tamil Nadu

#### Geography

Tamil Nadu covers an area of 130,058 km<sup>2</sup> (50,216 sq mi), and is the eleventh largest state in India. The bordering states are Kerala to the west, Karnataka to the north west and Andhra Pradesh to the north. To the east is the Bay of Bengal and the union territory of Puducherry. The southernmost tip of the Indian Peninsula is located in Tamil Nadu. At this point is the town of Kanyakumari which is the meeting point of the Arabian Sea, the Bay of Bengal, and the Indian Ocean. The south boundary of India is Kanyakumari, Tamil Nadu.



Topographic map of Tamil Nadu

#### **Physical Feature :**

The State is parted broadly into two natural divisions i.e., (a) the coastal plains and (b) the hilly western areas. It is further classified as Coromandal plains consisting of Kancheepuram, Tiruvallur, Cuddalore, Villupuram, Thiruvannamalai and Vellore and alluvial plains of Cauvery Delta expanding to Thanjavur, Nagapattinam Thiruvarur and part of Trichy and dry southern plains in Madurai, Ramanathapuram, Sivagangai, and

Kanyakumari Districts. The Western Ghats averaging 3000' to 8000' of height run along the western part with the hill groups of Nilgiris and Anamalais on either side of it. Palani

hills, Varashanad and Andipatti ranges are the major off-shoots of Ghats. The other prominent hills comprise of Javadhu, Shervarayan, Kalrayans and Pachai Malais. These ranges continue south of river Cauvery. A Plateau is found between these hills and the Western Ghats with an average elevation of 1000 feet raising west-ward. The highest peak Doddabettah in the Nilgris is 8650' above M.S.L.

Western Ghats form a complete watershed and there is no river passes through them. The main streams i.e., Paraliyar, Vattasery Phazhayar etc., are of limited length and fall in the Arabian sea. All other rivers are east-flowing rivers. The main rivers of Tamil Nadu are Cauvery (with tributaries of Bhavani, Amaravathi, Noyyal) Vaigai, Tamaraparani, Palar, Ponniyar and Vellar. Tamil Nadu has a coastline of about 910 km (570 mi) which is the country's third longest coastline.

#### **Climate:**

The climate of Tamil Nadu is basically tropical. Due to its proximity to the sea, the summer is less hot and winter is less cold in plains, the maximum daily temperature is 44.4'c and the minimum temperature is 4.4'c. Tamil Nadu is mostly dependent on monsoon rains, and thereby is prone to droughts when the monsoons fail. The climate of the state ranges from dry sub-humid to semi-arid. The state has three distinct periods of rainfall:

- Advancing monsoon period, south west monsoon from June to September, with strong southwest winds;
- North east monsoon from October to December, with dominant north east winds;
- dry season from January to May.

The special feature of climatic conditions in Tamil Nadu is that the four seasons are not distinct and overlap with immediate next season. In the plains there is no winter season and in the hills summer is not severe allowing continuous production of horticultural crops in the state.

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There are areas with temperature climate (above 2000 m), subtropical climate (1000 – 2000 m), humid tropical climate 500 – 1000m and tropical climate (upto 500 m) to accommodate all possible types of horticultural crops.

These overlapping seasons have made possible grapes to grow round the year, vegetables and spices in all possible crop rotations and systems of planting. Nearness to the equator and the presence of long stretch of Western Ghats, discontinuous Eastern Ghats and presence of hills and hillocks in the Plains help moderation of climate to ensure the required heat units and degree – days for growing different kinds of horticultural crops.

#### **Broad classification of Horticultural Crops:**

Horticulture crops are classified in to six categories viz., Fruit Crops, Vegetable Crops, Spices and Condiments, Plantation Crops, Flower Crops and Medicinal and Aromatic Plants.

Based on the climatic preferences they are classified as:

Tropical fruit Crops like Banana, Mango, Citrus, Grapes, Guava, Sapota, Papaya, Ber, Pomegranate, Fig, Amla, Custard apple and Pineapple and Sub-Tropical fruits like, Mangosteen, Phalsa, Avocado, etc., The state is the largest producer of bananas, flowers, tapioca, the second largest producer of mango, natural rubber, coconut, groundnut and the third largest producer of coffee, sapota and Tea

#### Fruit crops:

Fruits crops which come up in cool temperatures and high altitudes are known as temperate fruits. In the hilly areas of Tamil Nadu, the commonly grown temperate fruit crops are Apple, Pear, Persimmons etc., Mango and banana are the leading fruit crops in Tamil Nadu accounting for over 87 per cent of the total fruit production.

Out of about 11.08 lakh ha. of Horticulture Crops in Tamil Nadu fruit crops account for 29.96%.

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#### **Vegetable Crops:**

In Tamil Nadu, the major vegetable crops are Tapioca, Onion, Tomato, Brinjal, Potato, Lablab, Drumstick, etc., Out of about 11.08 lakh ha. of Horticulture Crops in Tamil Nadu, Vegetables crops are cultivated in 2.84 lakh ha. accounting for 25.63%.

#### **Spices & condiments**

Spices and Condiments constitute a very important group of horticultural crops. High income generation and foreign exchange earnings are possible through exports of spices. Spices and Condiments are grown in 1.73 lakh ha. In Tamil Nadu which is around 15.61% of total Horticulture Crops. The important spices crops are Chilles (dried), Pepper, Turmeric, Tamarind, Cardamom, Cloves, etc.,

#### Plantation crops

Plantation Crops are ideally taken up on hill slopes or in valleys. The important Plantation Crops grown in Tamil Nadu are Tea, Coffee, Rubber, Cashew, Bamboo, Cocoa, etc., About 2.75 lakh ha of plantation crops are grown which account for 24.82% of total horticulture crops.

#### Flowers

The major area under flowers constitutes domestic flowers such as Jasmine, Crossandra, Tuberose, Chrysanthemum, etc., More than twenty different varieties of flowers are cultivated and all flowers are grown according to the prevailing climatic condition. With its varying climatic conditions in the hill ranges and plains, Tamil Nadu offers rich scope for production of various flower crops. Flower crops are grown in 0.32 lakh ha in Tamil Nadu out of 11.08 lakh ha of total Horticulture crops.

#### **Medicinal & Aromatic Plants**

Medicinal & Aromatic plants are grown in about 0.12 lakh ha. There is a positive approach for increasing the area in the forth coming years due to potential export value of Medicinal and Aromatic plants. The important Medicinal and Aromatic Plants grown in Tamil Nadu are lemon grass, senna, coleus, Glory lilly, Periwinkle and other plan

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SI.No.	Year	Area (Ha)	Prodn. (MT)	Prodty. (MT/Ha)
1.	1980 – 81	461644	4477937	9.07
2.	1981 – 82	548175	4084025	7.45
3.	1982 – 83	568304	4321640	7.06
4.	1983 – 84	563153	4631285	8.22
5.	1984 - 85	595346	5470365	9.19
6.	1985 – 86	597261	5311432	8.89
7.	1986 - 87	583652	5384020	9.22
8.	1987 – 88	614713	5859205	9.53
9.	1988 – 89	598989	6302870	10.52
10.	1989 – 90	615230	7299993	11.87
11.	1990 – 91	603873	7087220	11.74
12.	1991 - 92	628789	7936149	12.62
13.	1992 - 93	676858	7395789	10.93
14.	1993 – 94	718428	9061152	12.61
15.	1994 – 95	717219	10142494	14.14
16.	1995 – 96	688478	9727361	14.13
17.	1996 - 97	722931	8779207	12.14
18.	1997 - 98	764127	11128371	14.56
19.	1998 - 99	786442	9837041	12.51
20.	1999 – 2000	834545	9927608	11.89
21.	2000 - 01	850222	11529792	13.56
22.	2001 – 02	852645	11715345	13.74
23.	2002 – 03	777172	9168424	11.79
24.	2003 – 04	824586	9945502	12.06
25.	2004 – 05	858552	12617300	14.70
26.	2005 – 06	890189	14126277	15.89
27.	2006 - 07	922017	16093071	17.45
28.	2007 – 08	930902	16203786	17.41
29.	2008 - 09	985591	16145197	17.4
30.	2009 – 10	922005	14309053	15.52
31.	2010 – 11	940395	14838629	15.78

Area, Production & Productivity of Horticultural Crops from 1980 – 81 to 2012 – 13

32.	2011 - 12	1001380	15261744	15.24
33.	2012-13	943768	13607033	14.42
34.	2013-14 (P)	1146036	19131320	16.69
35.	2014-15 (E)	1204401	21044450	17.47

## Nine fold Classification

Information on Land use pattern mirrors the picture which we can see how the total geographical area of the State is being utilized for various purposes. Total geographical area was 1.30 crore ha. during 2010-11. The geographical area increased by 44 ha. compared to the previous year the increase in the total geographical area of 44 ha was based on the latest survey as reported by the Revenue official of Namakkal (1ha.) and Erode (43 ha.)

The nine fold classification to the total geographical area of the state is set out below: (in ha)

SI. No	CLASSIFICATION	2012-13	2011-12	2010 - 11	2009 - 10	2008 - 09	2007 - 08	2006 – 07
1.	Forests	2125475	2125475 (16.3)	2125475 (16.3)	2126672 (16.3)	2105906 (16.2)	2105818 (16.2)	2106113 (16.2)
2.	Barren and uncultivable land	488512	488557 (3.7)	489253 (3.8)	490335	491908 (3.8)	492229	502404 (3.9)
3.	Land put to non-	2183903	2180732	2177034	(3.0)	(3.0)	2169195	2159781
	agricultural uses		(16.7)	(16.7)	2175608	2172597	(16.7)	(16.6)
4.	Cultivable waste	328026	329117 (2.5)	330938 (2.5)	326445 (2.5)	333441 (2.6)	346889 (2.7)	354264 (2.7)
5.	Permanent pastures and other grazing	109568	109568 (0.8)	109568	109924	110009	110127	110293
	lands		(0.0)	(0.8)	(0.8)	(01.8)	(0.8)	(0.8)
-	Misc. tree crops and groves not	249544	252468 (1.9)	252080 (1.9)	252828	258965	261025	268071
	included in the net				(1.9)	(2.0)	(2.0)	(2.1)
7.	Current fallow	1308159	967037 (7.4)	1014937 (7.8)	1116981	1013374	980732	906578
			. ,	<b>、</b> - <b>/</b>	(8.6)	(7.8)	(7.5)	(7.0)

8.	Other fallow lands	1695689	1594305 (12.5)	1580173 (12.1)	1542137 (11.8)	1497549 (11.4)	1498720 (11.5)	1493069 (11.5)
9.	Net area sown	4544240	4985857 (38.3)	4953658	4892142 (37.5)	5042896 (38.7)	5061919 (38.9)	5126072 (39.3)
Total	Geographical area	13033116	13033116	13033116	13033072	13026645	13026645	13026645
Area once		595592	903815 (6.9)	799006 (6.1)	679568 (5.2)	781352 (6.0)	753255 (5.8)	716718 (6.0)
Gros	s area sown	5139832	5889672 (45.2)	5752664 (44.1)	5571710 (42.8)	5824248 (44.7)	5815174 (44.6)	5842790 (44.9)

#### MISSION FOR INTEGRATED DEVELOPMENT OF HORTICULTURE

### (NATIONAL HORTICULTURE MISSION)

The National Horticulture Mission is being implemented in Tamil Nadu from 2005-06 onwards. It is implemented through TANHODA (Tamil Nadu Horticulture Development Agency) which is a special purpose vehicle to implement Government of India schemes. The assistance which was 100% from Government of India was changed to 85:15 of Central and State Government assistance from 2007-08 onwards.

During XII plan from 2014-15, this scheme is subsumed under the scheme Mission for Integrated Development of Horticulture (MIDH).

The scheme is implemented in 22 Districts, namely Ariyalur, Coimbatore, Cuddalore, Dharmapuri, Dindigul, Erode, Kanyakumari, Krishnagiri, Madurai, Ramnad, Salem, Sivagangai, Theni, Trichy, Tiruppur, Tirunelveli, The Nilgiris, Perambalur, Pudukottai, Tanjore, Vellore and Villupuram.

The main objectives of National Horticulture Mission are:

- Provide holistic growth of Horticulture sector through area based strategies which include technology promotion, extension, post harvest management, processing and marketing.
- Enhance Horticulture Production, Nutritional security and income support to farm house holds.
- Establish convergence and synergy among on -going plan programmes for Horticulture Development
- > Promote, develop and disseminate technologies for Horticulture development
- Create employment generation opportunities for skilled and unskilled persons especially unemployed youth.

The scheme envisages mandate crops Viz. Mango, Amla, Banana, Grapes, Orange, Guava, Papaya, Acid lime, Orange, Spices, Flowers, Aromatic crops, Cashew and Cocoa. The scheme is implemented through District Mission Committees headed by District Collector and the District Joint Director of Horticulture/ Deputy Director of Horticulture as the Member-Secretary of the Committee.

The following components are to be implemented during this year.

- Production of planting Material
- Establishment of new gardens (ha.)
- Rejuvenation/ replacement of senile plantation including Canopy management
- Protected cultivation
- INM/IPM
- Organic Farming
- Pollination support through beekeeping
- Horticulture Mechanization
- Technology Dissemination through demonstration/ Front Line Demonstration (FLD - Public Sector)
- HRD including horticulture institute
- Mission Management.
- Projects and National Seminar
- INDO-ISRAEL Projects

The National Horticulture Mission will be implemented in Tamil Nadu during 2014-15, at an outlay of Rs. 115.85 crores covering an area of 13255 Ha in 22 districts with the revised guidelines under Mission for Integrated Development of Horticulture.

#### **District: Nilgiri**

#### Profile

The Nilgiris, because of its natural charm and pleasant climate, was a place of Special attraction for the Europeans. In 1818, Mr. Whish and Kindersley, who were assistants to the Collector of Coimbatore, discovered the place Kotagiri near Rengaswamy peak. John Sullivan, the then Collector of Coimbatore was greatly interested in this part of the country. He established his residence there and reported to the Board of Revenue on 31st July 1819.

The Name 'Nilgiris' means Blue hills (Neelam – Blue and giri – Hill or Mountain) the first mention of this name has been found in the Silappadikaram. There is a belief that the people living in the plains at the foot of the hills, should have given the name, the Nilgiris, in view of the violet blossoms of 'kurinji' flower enveloping the hill ranges periodically. The earliest reference to the political history of the Nilgiris, according to W.Francis relates to the Ganga Dynasty of Mysore.

#### **Geographical Location of the District**

The Nilgiris is situated at an elevation of 900 to 2636 meters above MSL. Its latitudinal and longitudinal dimensions being 130 KM (Latitude : 10 - 38 WP 11-49N) by 185 KM (Longitude : 76.0 E to 77.15 E). The Nilgiris is bounded on North by Karnataka State on the West by Coimbatore District, Erode District, South by Coimbatore District and Kerala State and as the East by Kerala State.

In Nilgiris District the topography is rolling and steep. About 60% of the cultivable land falls under the slopes ranging from 16 to 35%

The main income to the district mainly depends upon the horticulture crops which are grown in Nilgiris district such as annual Crops Potato, Cabbage, Carrot, Beans and Plantation Crops like Tea and coffee.

S.NO	NINE FOLD CLASSIFICATION (2013-2014)	AREA (HA)
1	Forest	142576.70
2	Barren and uncultivable land	3374.72
3	Land put to Non-agricultural uses	9976.15
4	Cultivable waste	1559.87
5	Permanent pastures and other grazing lands	5077.98
6	Miscellaneous trees crops and groves not included in the net area sown	3820.45
7	Current fallow lands	3685.86
8	Other fallow lands	9484.66
9	Net- Cultivable Area	74928.55
10	Total Geographical area	254484.94

## Field Visit

# Perimetro Vegetable Cluster Development Programme (RKVY) – The Nilgiris

Details	Remarks
Name & address of Market Aggregator	Thiru.Balakrishnan
	BGM traders, Ooty
Total arrival of vegetables	Report enclosed.
	Arrival of vegetables
	On an average 4000 kgs of
	vegetables per day
Year of establishment	2013-14 (From
	September'2013 onwards)
Name of the collection center opened	<ol> <li>Anikorai at Ooty</li> <li>Kilkavatty at Ooty</li> </ol>
	Name & address of Market Aggregator Total arrival of vegetables Year of establishment

5.	Farmers cluster formed	Details enclosed
6.	Details of Subsidy released as on November'2014	Details enclosed
7.	Objective of this project	<ol> <li>To increase the area under vegetable crops to meet out the demand of vegetables</li> <li>To maintain the nutritional security.</li> <li>To enhance productivity of vegetable cultivation.</li> <li>Promotion of Farmers producers organization.</li> <li>To promote market garden</li> <li>To enhance the standard of living of farmers.</li> <li>Narrow down the gap between producers and consumers.</li> </ol>

# PERI METRO CLUSTER DEVELOPEMENT PROGRAMME- THE NILGIRIS DISTRICT

S.No	Month and Year	Carrot	Potato	Beans	Beetroot	Knol-Kowl
		(in MT)	(in MT)	(in MT)	(in MT)	(in MT )
1	September 2013	63.0	85.0	5.5	4.0	2.2
2	October 2013	67.0	65.5	4.0	3.7	1.0
3	November 2013	55.0	70.0	3.8	4.2	0.8
4	December 2013	47.5	55.6	2.0	2.8	2.5
5	January 2014	52.4	38.5	1.0	1.5	1.5

# Vegetable arrival to the collection centers

6	February 2014	-	-	-	-	-
7	March 2014	-	-	-	-	-
8	April 2014	-	-	-	-	-
9	May 2014	37.0	10.0	5.5	3.5	0
10	June 2014	-	-	-	-	-
11	July 2014	68.5	38.7	2.3	4.7	0
12	August 2014	49.0	28.2	4.2	1.8	0
13	September 2014	25.0	33.0	2.5	2.2	0
14	October 2014	32.3	40.0	4.4	3.9	0
15	November 2014	65.0	63.0	5.7	4.9	0

	PERI METRO VEGE	FABLE CI	LUSTER DE	EVELOPMEN	T PROGRAMM	E
MC	ONTHLY REPORT FOR THE N NILGIRIS D			BER 2014-	Fin:Rs	s. in lakhs
			Target		Achi	evement
SINo.	Scheme Components	Unit	Phy	Fin	Phy	Fin
1	Vegetable cultivation	На				-
	Open field		300	67.500	100.64	12.00
	Hybrid		400	135	626.30	90.76
2	Protected Cultivation	sqm	-	-	-	-
	Shade net		-	-	-	-
	Poly House		2	9.350	2	9.35

	Total		7786	343.355	5678.94	190.77
12	Training	Nos	4407	66.105	4407	66.105
11	Cool Chamber	Nos	5	0.100	-	-
10	Pack House	No.	2	6.000	-	-
9	Seed Production	hA	-	-	-	-
	Vermi Bed		15	0.750	8	0.40
	Vermicompost Unit		4	1.200	4	1.20
8	Organic farming	На				
7	INM/IPM	На	525	5.250	525	5.25
	No. of farmers		-	-	-	-
6	Cluster foramtion		2125	42.50	-	-
5	Retail outlets	No.	-	-	-	-
4	Refer vans/ containers	No.	1	9.600	6	5.7
3	Collection centres	No.	-		-	-

# **Micro Irrigation**

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Santhamani, W/o Ponnusamy,
		Kulisolai.
2	Total land available with the beneficiary (ha).	1.00.0
3	Type of MI system availed Drip/ Sprinkler	Sprinkler
4	Crop(s) covered	Hill Vegetables

5.	Total area covered (ha)	1.00.0
6	Crop Spacing (for drip)	
7	Year of establishment	2011-2012
8	Name of Manufacturer/ Supplier	NFCL Industries Ltd.
9	Total subsidy paid & date of payment	Rs.20,645/-
10	Mode of payment	RTGS
11	Status of crop	Hill Vegetables
12	General upkeep (Very good/ Good/ Average/ Poor)	Good.
13.	Any other relevant observation by JIT.	

The crop carrot is under semi permanent sprinkler irrigation as supplied by NFCL Industries Ltd. in 2011-2012. Drip irrigation can be tried in some areas according to the spacing of the vegetables and land terrain. The farmers felt higher investment for drip irrigation under vegetables but can be advised to carry out due to its advantages of higher yield and water conservation.

#### **Micro Irrigation**

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	T.R. Gopala krishnan,
		S/o T.M.Ramagowder, Kulisolai.
2	Total land available with the beneficiary	1.00.0

	(ha).	
3	Type of MI system availed Drip/ Sprinkler	Sprinkler
4	Crop(s) covered	Hill Vegetables
5.	Total area covered (ha)	1.00.0
6	Crop Spacing (for drip)	
7	Year of establishment	2011-2012
8	Name of Manufacturer/ Supplier	NFCL Industries Ltd.
9	Total subsidy paid & date of payment	Rs.20,645/-
10	Mode of payment	RTGS
11	Status of crop	Hill Vegetables
12	General upkeep (Very good/ Good/ Average/ Poor)	Good.
13.	Any other relevant observation by JIT.	

# Production of Planting Material Nursery

Sr.	Details	Remarks
No.		
1	Name of the project	MPDA – Small Nursery
		500 Sq.m Poly Green House
		and
		1500 Sq.mt Shade net house
2	Year of Implementation	2012-13
3	Project Period	2012-13
4	Name of Implementing Agency	ChinconaMagalirSangam
5	Location of Project	Doddabetta, Chincona
6	Total Project Cost	Rs.7,25,000/-
7	Amount Released by DAC	Rs.3,12,500/-
8	Expenditure incurred	Rs.7,25,000/-
9	Status of Project	
	Name of Nursery and crop for which plants	Rosemary, Thyme,
	are produced	Oreganum, Citronella and
		Lemon Grass

Name of crops for which seeds produced	
Quantity produced/Annum	Rosemary plants : 6,00,000
	Nos
	Thyme : 50,000
	Nos
	Oreganum : 50,000
	Nos
	Citronella : 1,50,000
	Nos
	Lemon Grass : 1,50,000
	Nos
	Total : 10,00,000
	Nos
Quantity sold	10,00,000 Nos
Rate	Rs.2/- per plant
Amount realized through sale	Rs.20.000 lakhs
Whether NHM logo displayed	Yes
Other details	MPDA products are being
	disposed through an exclusive
	MPDA retail outlet established
	during 1998 at Doddabetta
	view point which is a tourist
	spot in addition products are
	sold through the mobile van
	owned by the MPDA in the
	Government Botanical
	Garden, Ooty.The products
	like essential oils, different
	grades of Tea dust and spices
	are being sold through mobile
	van. Turnover per annum is
	Rs.6.000 lakhs and net profit
	is shared among the SHG
	members.

Medicinal plants are grown in the nursery and 13 types of essential oils also been extracted through steam processing method. The group is being organized through NGO-HOPE (Health of People and Environment). Nurseries on medicinal plants are carried out in polyhouses and shade nets. Traditional method of nursery without poly bags is being carried out. To increase the productivity two more green houses, drying machine and dehydration unit have been requested by the organization. Solar driers can be recommended for drying of medicinal plants through Agricultural Engineering Department.

## **Protected Cultivation**

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	N.Bheeman, S/o R.Nanja Gr., Thuneri
2	Total land available with the beneficiary (ha).	820 Sq.mt.
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Hi-tech
4.	Year of establishment	2012-2013
5.	Size of Structure (Sq. m)	820 Sq.mt.
6.	Total cost	Rs.5,33,300/-
7.	Agency involved in fabrication and installation	SMS Engineering, Fernhill Post, Udhagamangalam
8.	Total subsidy paid and date of payment.	Rs.2,66,500/-
9.	Crop being grown	Carnation
10.	Condition of Structure	Good
11.	Condition of Crop	Good
12.	Tie up with market	Yes
13.	General upkeep (Very good/ Good/ Average/ Poor)	Good
14	Any other relevant observation by JIT.	

# Protected CultivationPlanting Material

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	N.Bheeman, S/o R.Nanja Gr., Thuneri
2	Total land available with the beneficiary (ha).	5000 Sq.mt.
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Hi-tech (Planting Material)
4.	Year of establishment	2013-2014
5.	Size of Structure (Sq. m)	500 Sq.mt.
6.	Total cost	Rs.1,04,000/-
7.	Agency involved in fabrication and installation	KF Bio Plants Pvt. Ltd., Pune.
8.	Total subsidy paid and date of payment.	Rs.51,000/-
9.	Crop being grown	Carnation
10.	Condition of Structure	Good
11.	Condition of Crop	Good
12.	Tie up with market	Yes
13.	General upkeep (Very good/ Good/ Average/ Poor)	Good
14	Any other relevant observation by JIT.	

## **Observations:**

## Protected Cultivation 2012-2013, Planting Material 2013-2014

Under protected cultivation Carnation flowers are being raised in polyhouses. The general problems faced are marketing as they have to send only to Bangalore. General observation is that cluster formation of the farmers is very much required and the cold storage facility of the department may be utilized.

Sr.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	Steenu W/o N.Senthilkumar
	field visited.	Kodhumudi
2	Total land available with the beneficiary (ha).	1000 Sq.mt.
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Hi-tech
4.	Year of establishment	2014-15
5.	Size of Structure (Sq. m)	1000 Sq.mt.
6.	Total cost	Rs.9,35,000/-
7.	Agency involved in fabrication and installation	Sri Roz Consultants Pvt. Ltd., Pune.
8.	Total subsidy paid and date of payment.	Rs.4,67,500 /- (yet to be released)
9.	Crop being grown	Carnation
10.	Condition of Structure	Good
11.	Condition of Crop	Good
12.	Tie up with market	Yes
13.	General upkeep (Very good/ Good/ Average/ Poor)	Good
14	Any other relevant observation by JIT.	

# **Protected Cultivation**

# Protected CultivationPlanting Material

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	H.Mallan, S/o Hutchan, Thuneri
2	Total land available with the beneficiary (ha).	500 Sq.mt.
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Hi-tech (Planting Material)
4.	Year of establishment	2013-2014
5.	Size of Structure (Sq. m)	500 Sq.mt.
6.	Total cost	Rs.2,88,000/-
7.	Agency involved in fabrication and installation	Florence & Flora, Bangalore
8.	Total subsidy paid and date of payment.	Rs.51,000/-
9.	Crop being grown	Carnation
10.	Condition of Structure	Good
11.	Condition of Crop	Good
12.	Tie up with market	Yes
13.	General upkeep (Very good/ Good/ Average/ Poor)	Good
14	Any other relevant observation by JIT.	

Sr.	Details	Remarks
No.		
1	Name & address of Beneficiary whose field visited.	Tmt. V. Sangeetha, W/o. Loganathan , Keircombai, Kotagiri
2	Total land available with the beneficiary (ha).	0.1 ha
3	Type of Protected cultivation activity (Hi- tech/Normal GH, Shade net, Plastic tunnel)	Hi-tech Poly Green House
4.	Year of establishment	2013-14
5.	Size of Structure (Sq. m)	500 Sq.mt
6.	Total cost	Rs.4,25,000/-
7.	Agency involved in fabrication and installation	Florance Flora, GaneshaTemple , Road, Bangalore
8.	Total subsidy paid and date of payment.	Rs.1,25,000/-
9.	Crop being grown	Lillium
10.	Condition of Structure	Good
11.	Condition of Crop	Good
12.	Tie up with market	Bangalore
13.	General upkeep (Very good/ Good/ Average/ Poor)	Good
14	Any other relevant observation by JIT.	

# Protected Cultivation (Planting Material)

Here the crop is Lillium and the planting materials are from Netherlands. The crops have been laid out in beds with cocopeat. The irrigation is being taken up through pipes and drip may be emphasized.

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	Thiru. Vemula Vinoth Goud S/o.Rama Goud, Nedugula, Kotagiri
2	Total land available with the beneficiary (ha).	0.1 ha
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Hi-tech Poly Green House
4.	Year of establishment	2013-14
5.	Size of Structure (Sq. m)	500 Sq.mt
6.	Total cost	Rs.4,20,000/-
7.	Agency involved in fabrication and installation	Florance Flora, GaneshaTemple , Road, Bangalore
8.	Total subsidy paid and date of payment.	Rs.1,25,000/-
9.	Crop being grown	Lillium
10.	Condition of Structure	Good
11.	Condition of Crop	Good
12.	Tie up with market	Bangalore

### **Protected Cultivation (Planting Material)**

13.	General upkeep (Very good/ Good/ Average/ Poor)	Good
14	Any other relevant observation by JIT.	

### Protected Cultivation 2013-2014

The crop is Lillium and is the fourth crop taken under polyhouse. The crop is irrigated with pipelines and drip irrigation may be emphasized for better productivity. Planting materials has also been supplied. The construction of the polyhouse is very good and maintained well.

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Thiru. C. Vinoth, S/o. Chikkan, Nedugula, Kotagiri
2	Total land available with the beneficiary (ha).	1.60 Ha.
3	Type of MI system availed Drip/ Sprinkler	Sprinkler
4	Crop(s) covered	Carrot
5	Total area covered (ha)	0.80.0 Ha.
6	Crop Spacing (for drip)	-
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	EPC Industrial Ltd.,

## **Micro Irrigation**

9	Total subsidy paid & date of payment	Rs. 20,231/-, 27.2.2013 (100% Subsidy)
10	Mode of payment	ECS
11	Status of crop	Good
12	General upkeep (Very good/ Good/ Average/ Poor)	Good
13.	Any other relevant observation by JIT.	

## Micro Irrigation 2012-2013

Irrigation is being done with sprinklers for hill vegetables especially for carrot. Sprinkler irrigation with 5 sprinkler heads has been supplied. The farmer has extended with additional 5 sprinkler heads for uniform distribution.

## **Protected Cultivation (Planting Material)**

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	Thiru. Surendra Mohan, Warwick Estate, Kotagiri
2	Total land available with the beneficiary (ha).	0.1 ha
3	Type of Protected cultivation activity (Hi- tech/Normal GH, Shade net, Plastic tunnel)	Hi-tech Poly Green House
4.	Year of establishment	2013-14
5.	Size of Structure (Sq. m)	500 Sq.mt

6.	Total cost	Rs.2,70,000/-	
7.	Agency involved in fabrication and installation	Krithiya Jayaraman, Warwick Estate, Kotagiri	
8.	Total subsidy paid and date of payment.	Rs.1,25,000/-	
9.	Crop being grown	Lillium	
10.	Condition of Structure	Good	
11.	Condition of Crop	Good	
12.	Tie up with market	Bangalore	
13.	General upkeep (Very good/ Good/ Average/ Poor)	Good	
14	Any other relevant observation by JIT.		

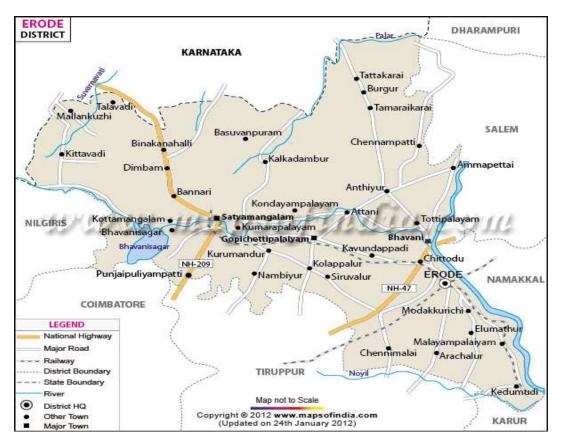
# **District Photographs**







#### **District: Erode**



## **Erode District**

National Horticulture Mission is being implemented in Erode District from 2005-2006 in 14 blocks at present as shown below.

The entire Thalavadi block and Bargur belongs to Anthiyur block lies on the hills of Western Ghats.

#### Location

Erode District lies on the extreme north of Tamil Nadu. It is bounded mostly by Karnataka State and also River Palar covers pretty long distance. To the East lies Namakkal and Karur Districts. Tirupur District is its immediate neighbour to the South and on the West, it has Coimbatore and Nilgiri Districts, as its boundaries. Thus Erode District is essentially a land-locked area having no sea-cost of its own. Erode District situated at between 10 36" and 11 58" North Latitude and between 76 49" and 77 58" East Longitude.

## Climate

Erode District has dry weather with maximum and minimum temperature ranging between 40<sup>°</sup> C and 18<sup>°</sup> C respectively.

## Rainfall

The district in general is characterised with a scandy rainfall. The average rainfall of Erode District is 717 mm. The scandy showers during March to May do not provide any relief to the oppressive heat. There is a light improvement in the climate during June-August period. During this pre-monsoon period, the mercury reverses its trend and by September, the sky gets overcast heavily but the rains are meagre. North-east monsoon sets in vigorously only during October-November and by December, the rains disappear rendering the climate clear but pleasant.

### Land Classification

S.No	Details Area (Ha)	
1	Forest crops	1425
2	Uncultivable waste	6257
3	Land put to Non-Agricultural use	53174
4	Cultivable waste	1731
5	Permanent Pasture & Grass land	101
6	Miscellaneous Tree Crops 1029	
7	Current fallows 80943	
8	Other fallow	18218
9	Net area cultivated	183300
	Area sown more than once	15215
	Total area cultivated	198515
	Total	346178
	Reserve Forest	226086
	Total Geographical area	572264

## Area, Production and Productivity of Horticulture Crops - 2013-14.

Erode stands first in production and marketing of Turmeric, all over India. Erode District is very important market centre for Turmeric. Turmeric is received, not only from

Erode district, but also from the other parts of Tamil Nadu and adjoining district like Mysore in Karnataka State.

SI.No	Name of the crops	Area(Ha)	Production (MT)	Yield in MT/Hect
_	A.FRUITS			
1	Banana	7056	223986	31.74
2	Mango	951	12070	12.69
3	Guava	106	1912	18.04
4	Sapota	71	1321	18.60
5	Рарауа	164	12141	74.03
7	Amla	210	3989	18.99
8	Other Fruits	118	1435	
	Total	8676	256853	
	B. VEGETABLES			
1	Potato	249	2417	9.71
2	Таріоса	3300	81761	24.78
3	Yam	143	4351	30.43
4	Onion	1143	14747	12.90
5	Brinjal	132	3278	24.83
6	Tomato	267	4335	16.23
8	Other Vegetables	1532	16838	
_	Total	6766	127726	
	C.SPICES AND CONDIMENTS			
1	Chillies	37	559	15.11
2	Turmeric	6237	29568	4.74
3	Tamarind	96	924	9.62
4	Other Spice crops	59	301	

	Total	6429	31351	
	D.PLANTATION CROPS			
1	Arecanut	267	853	3.20
2	Сосоа	309	5748	18.60
3	Other Plantation Crops	202	2390	
	Total	778	8992	
	E.MEDICINAL AND AROMATIC PLA	ANTS.		
1	Coleus	47	366	
	Total	47	366	
	F. FLOWERS			
1	Jasmine	1236	9999	8.09
2	Tuberose	265	2765	10.43
3	Mary Gold	95	2197	23.13
4	Other Flowers	108	754	
	Total	1704	15715	
	Grand Total	24400	441003	

## **BULBOUS SUCCSESS STORY – PERUNDURAI BLOCK**



Name of the farmer	A.Mani
Father's Name	Aarappa gr
Address	Uppiliangadu,
	Chinna alampalayam,
	Pappampalayam.
Phone Number	9976626613
Land & Water asset Details	Land Holding -2.14.0Ha
	Water source – open well and bore well.
Details of intervention made by	1.Proper selection of Plantingmaterials.
the farmer with methodology	2.Biological seed treatment.
	3.Land Preparation – totally weed free.
	4.Integrated nutrient management along with Bio- fertilizers.
	5.Installation of drip system.
Outcome	1.Regular inflow of income
	2.40% more income generated because of labour saving & proper water management .
Lesson Learnt from Farmers Experience	1.Selection of quality planting material ensures good crop stand.
	2.Effective weed control measures to be taken right from the beginning.
	3.Water saving technology due to drip.

## SUCCESS STORY

## MULCHING IN FLOWER & VEGETABLE CROPS BLOCK : SATHYAMANGALAM

Name of the farmer	M.P.PALANISAMY	
Fathers Name	PONNUSAMY GOUNDER	
Address	M.R.PALANISAMY S/o.Ponnusamy Gounder Kulaththu pirivu Chikkarasampalayam P.O SathyamangalamTaluk	
Phone Number	9443327450	
Land & Water asset Details	Land Holding – 4 Ha (Garden land) Soil type – Clay loamy Water Source – Open Well and Lift irrigation from river.	
Details of intervention made by the farmer with methodology	<ul> <li>1.Using Plastic mulching sheet in vegetable a flower cultivation to control weeds and water evaporation.</li> <li>2. Installed Micro irrigation system with fertigation for effective usage of water and fertilizer.</li> </ul>	
Outcome	Normally vegetable cultivation required 3 weeding with 25 labours per weeding. So farmer saves minimum Rs. 10000 in labour cost. He also saved 40% of water by controlling water evaporation. By improved microbial activity, He gained 25% yield more than the normal.	
Lesson Learnt from Farmers Experience	Mulching improved the microbial activity and enriched soil fertility. Saves water and fertilizer usage. Saves labour and Improve the quality of the produces.	
The Automation and the second second		

# National Mission on Micro Irrigation

# **ERODE DISTRICT**

		Subsidy released			
SL.No.	Year	Area(Ha)	Subsidy Amount (Rs.in Lakhs)	No of Beneficiaries	
1	2007-08	1278.15	340.531	815	
2	2008-09	981.16	260.350	692	
3	2009-10	1758.33	385.290	1574	
4	2010-11	685.34	211.710	540	
5	2011-12	666.01	436.820	1000	
6	2012-13	1543.17	753.400	1393	
7	2013-14	1189.31	810.431	1604	
8	2014-15	1067.65	814.548	1167	
	TOTAL	9169.12	4013.080	8785	

# Field visit

# **Micro Irrigation**

SI. No.	Details	Remarks
1	Name & address of beneficiary visited.	Sivalingam
		W/o. Subbaiyan
		Baguthampalayam.
2	Total land available with the beneficiary	
	(ha).	
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Banana

5.	Total area covered (ha)	0.50.0	
6	Crop Spacing (for drip)	1.2M	
7	Year of establishment	2011-12	
8	Name of Manufacturer/ Supplier	Sujay	
9	Total subsidy paid & date of payment	Rs. 16,185	
10	Mode of payment		
11	Status of crop		
12	General upkeep (Very good/ Good/ Average/ Poor)		
13.	Any other relevant observation by JIT.		

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Parthiban
		S/o. Subbaiyan
		Baguthampalayam.
2	Total land available with the beneficiary	
	(ha).	
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Jasmine, Banana
5.	Total area covered (ha)	0.60.0
6	Crop Spacing (for drip)	1.2M
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	Sujay
9	Total subsidy paid & date of payment	Rs. 43,816

10	Mode of payment	
11	Status of crop	
12	General upkeep (Very good/ Good/ Average/ Poor)	
13.	Any other relevant observation by JIT.	

SI. No.	Details	Remarks
1	Name & address of beneficiary visited.	Chitradevi
		W/o. (Late) Mahalingam
		Baguthampalayam
2	Total land available with the beneficiary (ha).	1.00.0
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Jasmine, Vegetable
5.	Total area covered (ha)	0.40.0
6	Crop Spacing (for drip)	1.2M
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	Parixit
9	Total subsidy paid & date of payment	Rs. 43,816
10	Mode of payment	Cheque
11	Status of crop	
12	General upkeep (Very good/ Good/ Average/ Poor)	
13.	Any other relevant observation by JIT.	

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Shanmugam
		S/o. Veerappagr
		Baguthampalayam.
2	Total land available with the beneficiary (ha).	
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Banana
5.	Total area covered (ha)	0.60.0
6	Crop Spacing (for drip)	1.2M
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	Sujay
9	Total subsidy paid & date of payment	Rs. 43,814
10	Mode of payment	RTGS
11	Status of crop	
12	General upkeep (Very good/ Good/	
	Average/ Poor)	
13.	Any other relevant observation by JIT.	

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Dhanuskodi
		S/o. Karuppanan
		Baguthampalayam.
2	Total land available with the beneficiary	
	(ha).	
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Vegetables
5.	Total area covered (ha)	0.40.0

6	Crop Spacing (for drip)	1.2M
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	Parixit
9	Total subsidy paid & date of payment	Rs. 43,816
10	Mode of payment	RTGS
11	Status of crop	
12	General upkeep (Very good/ Good/ Average/ Poor)	
13.	Any other relevant observation by JIT.	

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Manoranjitham
		W/o. Appuraj
		Baguthampalayam.
2	Total land available with the beneficiary	
	(ha).	
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Vegetables
5.	Total area asylared (ba)	0.40.0
5.	Total area covered (ha)	0.40.0
6	Crop Spacing (for drip)	1.2M
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	Sujay
9	Total subsidy paid & date of payment	Rs. 43,816
5	Total subsidy paid & date of payment	1(3. 43,010
10	Mode of payment	RTGS
11	Status of crop	

12	General upkeep (Very good/ Good/ Average/ Poor)
13.	Any other relevant observation by JIT.

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Prema
		W/o.Nagaraj
		Baguthampalayam.
2	Total land available with the beneficiary (ha).	
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Banana
5.	Total area covered (ha)	0.77.0
6	Crop Spacing (for drip)	1.8M
7	Year of establishment	2013-14
8	Name of Manufacturer/ Supplier	Parixit
9	Total subsidy paid & date of payment	Rs.53,061
10	Mode of payment	
11	Status of crop	
12	General upkeep (Very good/ Good/	
	Average/ Poor)	
13.	Any other relevant observation by JIT.	

# Area Expansion (2014-15)

SI.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	K. Gopalsamy
	field visited.	S/o Kumarasamy
		Iyyansalai

2	Total land available with the beneficiary	1.00.0
	(ha).	
3	Crop Cluster under which covered.	0.25.0
4	Name & variety of crop planted.	Tuberose
5	Source of planting material.	Own source
6	Number of planting material.	-
7	Number of plants planted/ rejuvenated.	-
8	Date of plants which survived	100%
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due	Rs. 9375
	to the beneficiary as (Rs.)	
10	Amount paid and date of payment.	
11	Mode of payment.	
12	Source of Irrigation Water	Well
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	Drip
14.	Other inputs provided.	-
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-
18.	Available marketing facility for the crop.	Sathyamangalam
19.	Other infrastructure available in the	-
	vicinity.	
20.	General upkeep of the plot;	
	Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	

## Area Expansion (2014-2015)

The crop tuberose is of 5 months and irrigated by micro sprinklers of Netafim for which the farmer had laid of his own source. The subsidy is for the year 2014-15 and to be paid.

# Area Expansion (2014-15)

SI.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	Subbaiyan, S/o.Nanjundan,
	field visited.	Kothamangalam.
2	Total land available with the beneficiary	1.18.0
	(ha).	
3	Crop Cluster under which covered.	0.50.0
4	Name & variety of crop planted.	Turmeric BSR 1
5	Source of planting material.	Farmer
6	Number of planting material.	-
7	Number of plants planted/ rejuvenated.	-
8	Date of plants which survived	-
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due	Rs.6000/-
	to the beneficiary as (Rs.)	
10	Amount paid and date of payment.	To be paid
11	Mode of payment.	ECS
12	Source of Irrigation Water	Canal
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	Drip
14.	Other inputs provided.	-
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-
18.	Available marketing facility for the crop.	Erode Market.
19.	Other infrastructure available in the	-
	vicinity.	
20.	General upkeep of the plot;	
	Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	

SI. No.	Details	Remarks
1	Name & address of beneficiary visited.	Chennimalai gr(Nallasamy),
		S/o.Chellappan
		Kothamangalam.
2	Total land available with the beneficiary (ha).	2.50.0
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Banana, Pomegranate
5.	Total area covered (ha)	0.51.0
6	Crop Spacing (for drip)	1.8M
7	Year of establishment	2010-11
8	Name of Manufacturer/ Supplier	Netafim
9	Total subsidy paid & date of payment	Rs. 12,133
10	Mode of payment	Cheque
11	Status of crop	
12	General upkeep (Very good/ Good/ Average/ Poor)	
13.	Any other relevant observation by JIT.	

### **Observations:**

# Micro Irrigation (2010-2011)

The crops are pomegranate and banana irrigated by drip of Netafim given in 2010-11. The variety of pomegranate now in field is Bahua and the crop is well maintained and the drip system is working without any problems.

# Area Expansion (2009-10)

SI.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	Chitradevi
	field visited.	W/o. (Late) Mahalingam
		Baguthampalayam
2	Total land available with the beneficiary (ha).	1.00.0
3	Crop Cluster under which covered.	1.00.0
4	Name & variety of crop planted.	Jasmine Ramnad
5	Source of planting material.	Farmer
6	Number of planting material.	-
7	Number of plants planted/ rejuvenated.	-
8	Date of plants which survived	-
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due	Rs.12000/-
	to the beneficiary as (Rs.)	
10	Amount paid and date of payment.	Rs.12000/-
11	Mode of payment.	ECS
12	Source of Irrigation Water	Canal
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	Drip
14.	Other inputs provided.	-
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-
18.	Available marketing facility for the crop.	-
19.	Other infrastructure available in the	-
	vicinity.	
20.	General upkeep of the plot;	
	Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	

SI. No.	Details	Remarks
1	Name & address of beneficiary visited.	Chitradevi
		W/o. (Late) Mahalingam
		Baguthampalayam
2	Total land available with the beneficiary (ha).	1.00.0
3	Type of MI system availed Drip/ Sprinkler	Drip
4	Crop(s) covered	Jasmine, Vegetable
5.	Total area covered (ha)	0.40.0
6	Crop Spacing (for drip)	1.2M
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	Parixit
9	Total subsidy paid & date of payment	Rs. 43,816
10	Mode of payment	Cheque
11	Status of crop	
12	General upkeep (Very good/ Good/ Average/ Poor)	
13.	Any other relevant observation by JIT.	

#### **Observations:**

### Micro Irrigation (2012-2013)

The farms are a cluster of micro irrigation farmers having banana, vegetables and jasmine as their crop.

The drip system is from 2009-10, 2011-12, 2012-13 of Parixit and Sujay firms. The crops are well maintained with good marketing facility at Sathyamangalam.

Polyhouses may be constructed for jasmine and vegetables.

Sr.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	M.P.Palanisamy
	field visited.	S/o. Ponnusamygr
		Kulathuperivu
-		C.K.Palayam
2	Total land available with the beneficiary (ha).	3.99.0
3	Crop Cluster under which covered.	2.00.0
4	Name & variety of crop planted.	Tuberose Local
5	Source of planting material.	Farmer
6	Number of planting material.	-
7	Number of plants planted/ rejuvenated.	-
8	Date of plants which survived	-
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due	Rs.20000/-
	to the beneficiary as (Rs.)	
10	Amount paid and date of payment.	Rs.20000/-
11	Mode of payment.	ECS
12	Source of Irrigation Water	Bore Well
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	Sprinkler, Drip
14.	Other inputs provided.	-
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-
18.	Available marketing facility for the crop.	Sathyamangalam
19.	Other infrastructure available in the	-
	vicinity.	
20.	General upkeep of the plot;	
	Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	

# NHM - Mulching (2011-12)

### Mulching (2011-2012)

The crop is Tuberose and mulching with drip has been taken for the past 2 ½ years. The mulch sheet of 40 microns are in good conditions. As per the farmer, weed control and moisture conservation has been observed.

#### Details Sr. No. Remarks Name of the project RADP Farm Pond 1 Year of Implementation 2013-14 2 3 Project Period -4 Name of Implementing Agency Department of Horticulture 5 Location of Project R.Saminathan S/o. Ramasamy K.N.Palayam Rs.20000 6 Total Project Cost 7 Amount Released by DAC Rs.10000 8 Expenditure incurred Status 9 Current Status of Project (10x10x2)M • Dimension (L x B x W) 1,50,000 litres • Capacity • Command Area • Whether linked with new plantation or old plantation • Whether funds disbursed

#### Water Resources Development

## Vermibed (Silpaulin)

Sr. No.	Details	Remarks
1	Name of the project	RADP Vermibed (Silpaulin)
2	Year of Implementation	2013-14
3	Project Period	-
4	Name of Implementing Agency	Department of Horticulture
5	Location of Project	R. Saminathan
		S/o Ramasamy
		K.N. Palayam
6	Total Project Cost	Rs.10000/-
7	Amount Released by DAC	Rs.4000/-
8	Expenditure incurred Status	

### **Observations:**

# Water Resources Development and Vermibed (2013-2014)

Farm pond of 10mx10mx2m has been constructed and with water from well is pumped into the pond which has been lined with silpaulin sheets. The water is pumped for drip irrigation as well to save crops by gravity. The drip system used is of Nagarjuna.

Also a vermibed has been constructed and the compost is taken every two months to the field and applied which has proved to be very efficient.

## Area Expansion (2008-09)

Sr.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	T.V.Balraj
	field visited.	S/o. Venkadasalam Udaiyar,
		Ealur.T.N.Palayam.
2	Total land available with the beneficiary	4.00.0
	(ha).	

3	Crop Cluster under which covered.	2.00.0
4	Name & variety of crop planted.	Сосоа
5	Source of planting material.	Department of Horticulture
6	Number of planting material.	1000 Nos
7	Number of plants planted/ rejuvenated.	1000 Nos
8	Date of plants which survived	98 % ,1.12.14
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due	Rs.11250/- I year
	to the beneficiary as (Rs.)	Rs.4450/ - II year
		Rs. 8830/- III year
10	Amount paid and date of payment.	
11	Mode of payment.	
12	Source of Irrigation Water	Well
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	Drip
14.	Other inputs provided.	Organic Fertilizer- 320 Kgs
		19:19:19 - 10 Kgs
		Wettable Sulphur - 6 Nos
		Endosulphan - 4 Nos
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-
18.	Available marketing facility for the crop.	
19.	Other infrastructure available in the	-
	vicinity.	
20.	General upkeep of the plot;	
	Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	
	•	

# Area Expansion (2008-2009)

The cocoa as intercrop of coconut has been in voe since 2008-09. The crops are very good and the farmers feels that the shade effect has also increased the yield.

# Area Expansion (2014-15)

SI.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	V.P.Arumugam
	field visited.	S/o Palani gr
		Vaikkalthottam
		TN palayam
2	Total land available with the beneficiary (ha).	1.00.0
3	Crop Cluster under which covered.	0.80.0
4	Name & variety of crop planted.	Papaya Red Lady
5	Source of planting material.	Private nursery
6	Number of planting material.	3000 No's
7	Number of plants planted.	3000 No's
8	Date of plants which survived	100%
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due to the beneficiary as (Rs.)	Rs. 18,480
10	Amount paid and date of payment.	
11	Mode of payment.	RTGS
12	Source of Irrigation Water	Well
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	Drip
14.	Other inputs provided.	-
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-

18.	Available marketing facility for the crop.	Coimbatore
19.	Other infrastructure available in the vicinity.	-
20.	General upkeep of the plot; Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	

# Area Expansion Pandal (NADP) 2012- 2013

Sr.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	P.Sivakumar
	field visited.	S/o/Palanisamy
		Thaneerpandal
		T.N.Palayam
2	Total land available with the beneficiary	1.00.0
	(ha).	
3	Crop Cluster under which covered.	0.50.0
4	Name & variety of crop planted.	Bitter gourd- Preethi
		Ridge gourd - Rahini
5	Source of planting material.	Department of Horticulture
6	Number of planting material. (Seeds)	900 gms
7	Number of plants planted/ rejuvenated.	-
8	Date of plants which survived	-
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due	Rs.77800.00
	to the beneficiary as (Rs.)	
10	Amount paid and date of payment.	Rs.74977.00 + Seed
		(Rs.2823)
11	Mode of payment.	DD No. 158615/28.1.13
12	Source of Irrigation Water	Bore Well + Canal
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	
14.	Other inputs provided.	
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-

18.	Available marketing facility for the crop.	Gobi, Sathy, Erode
19.	Other infrastructure available in the	-
	vicinity.	
20.	General upkeep of the plot;	
	Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	

# Area Expansion (2012-2013)

The crop snake gourd and bitter gourd are to be taken in the following season. Higher yield has been obtained with drip laid out by the farmer at his own cost.

Precision Farming	(NADP)	(2012-2013)

Sr.	Details	Remarks
No.		
1	Name & address of Beneficiary whose	A.R.Sivakumar
	field visited.	S/o.Ramchandiran
		Varappallum
		T.N.Palayam
2	Total land available with the beneficiary (ha).	2.86.0
3	Crop Cluster under which covered.	1.00.0
4	Name & variety of crop planted.	Banana - Red Banana
5	Source of planting material.	Farmer
6	Number of planting material.	-
7	Number of plants planted/ rejuvenated.	-
8	Date of plants which survived	-
	(also indicate percentage survival).	
9	Total amount of subsidy assistance due	Rs.72564.00
	to the beneficiary as (Rs.)	Drip - Rs. 52,564 + Fertilizer -
		Rs. 20,000
10	Amount paid and date of payment.	Rs. 52,564 to Nagarjuna
		company

11	Mode of payment.	RTGS
12	Source of Irrigation Water	Well + Canal
	(Bore well/ Tube well/ Canel)	
13.	Whether Drip/ Sprinkle System in use.	Drip
14.	Other inputs provided.	19:19:19 - 110Kgs
		13:0:45 - 104 Kgs
15.	Whether assistance available for Organic	-
	Farming	
16	If so, area covered	-
17.	Assistance available	-
18.	Available marketing facility for the crop.	Gobi, Erode
19.	Other infrastructure available in the	-
	vicinity.	
20.	General upkeep of the plot;	
	Very good/ Good / Average/ Poor.	
21.	Any other relevant observation by the JIT.	

### Precision Farming (2012-2013)

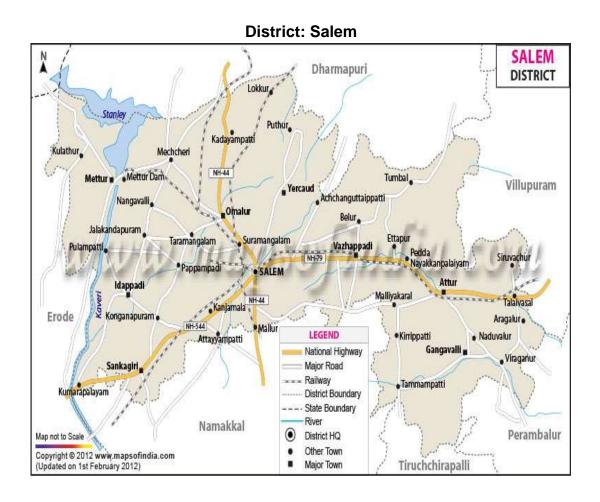
The farmer has laid drip irrigation for red banana with fertigation and the unit was supplied by M/s. Nagarjuna. 16 litres of water is supplied per plant per day through emitter pipes of 2.1 litre discharged per emitter spaced at 40 cm apart. The crop is very good with uniform growth. The first crop yield was about 22 kg per plant with the rate of about Rs.30 to Rs.35 per kg.

# Erode District Photographs









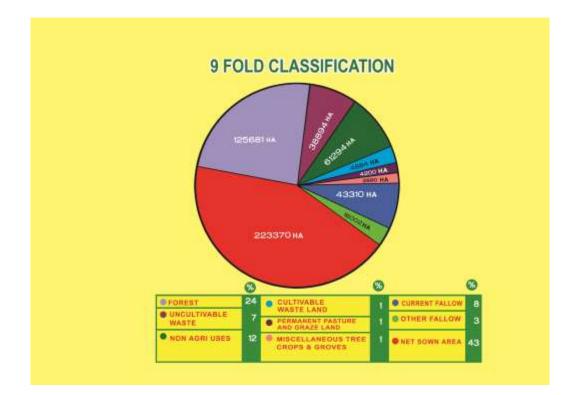
RAINFALL - N	IONTHWISE	FROM 2006-201	4
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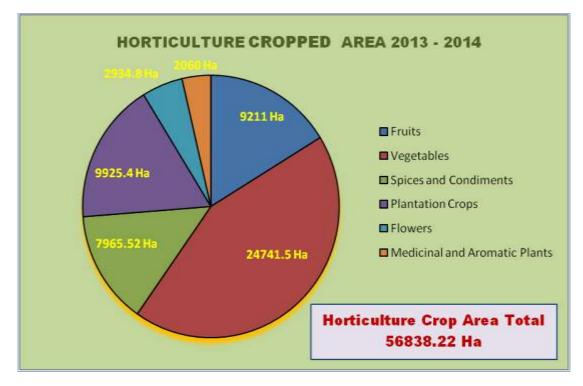
·								Unit: in	mm.		
		Rainfall Data									
	Month	Normal Rainfall	2006	2007	2008	2009	2010	2011	2012	2013	2014
	January	1.6	4.0	0.6	3.5	2.1	1.6	2.3	0.0	0.0	0.0
	February	2.7	0.0	0.5	9.3	0.3	0.0	5.2	0.0	17.6	0.9
	March	29.0	39.0	9.4	98.9	16.4	3.5	20.9	0.2	0.0	8.6
	April	62.4	26.7	91.2	38.3	41.9	22.6	145.7	38.5	41.2	5.3
	Мау	117.1	83.2	37.6	134.1	132.0	137.0	48.6	113.3	33.5	136.9
	June	55.2	54.4	34.0	54.6	51.8	118.8	38.2	42.2	84.3	62.9
	July	69.3	19.2	89.1	92.1	49.4	105.7	73.8	96.4	42.7	23.2
	August	147.8	92.5	196.0	239.8	148.0	181.7	182.2	121.3	132.7	125.7
	September	117.8	197.1	132.1	68.8	169.6	92.2	61.3	28.6	210.8	157.3

Ann		888.2					1014.4			798.4
December	45.0	12.3	157.7	17.4	44.2	72.6	46.4	13	39.7	
November	163.2	166.5	42.0	212.6	148.3	328.7	227.2	63.2	86.8	43.6
October	187.5	5 193.3	194.3	158.1	50.7	161.5	162.6	193.4	125.8	234

## Area, Production and Productivity of Horticulture Crop 2013 - 2014

	Name of the Oren	Area	Production	Productivity
SI. No	Name of the Crop	(in Ha.)	(in MT)	(in MT)
1	Fruits	9211	238564.9	25.9
2	Vegetables	24741.5	917909.65	37.1
3	Spices and Condiments	7965.52	182410.408	22.9
4	Plantation Crops	9925.4	18361.99	1.85
5	Flowers	2934.8	33163.24	11.3
6	Medicinal and Aromatic Plants	2060	3090	1.5
	Total	56838.22	1682105.25	





## Field Visit FIELD VISIT NO :1

## Area Expansion - Cocoa

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	Silamba Gounder S/o. Kolandasamy Pappukaran kadu, Mothaiyanur, Chinna goundanur Village, Sankagiri Block.
2	Total land available with the beneficiary (ha).	1.63.5 Ha
3	Crop Cluster under which covered.	Сосоа – 1.00 На
4	Name & variety of crop planted.	Cocoa - Forestero
5	Source of planting material.	Cadbury India Ltd, Salem.
6	Number of planting material.	Cocoa Seedlings – 500 Nos
7	Number of plants planted/ rejuvenated.	500 Nos
8	Date of plants which survived (also indicate percentage survival).	
9	Total amount of subsidy assistance due to the beneficiary as (Rs.)	Rs. 7,875 /-
10	Amount paid and date of payment.	Rs. 1145 /-
11	Mode of payment.	Cheque (No: 856374 / 13.12.2010)
12	Source of Irrigation Water (Bore well/ Tube well/ Canel)	Well
13	Whether Drip/ Sprinkle System in use.	Drip System
14	Other inputs provided.	Inputs 2009-10 – Rs. 4480 /- Inputs 2010-11 – Rs. 2250 /-
15	Whether assistance available for Organic Farming	-
16	If so, area covered	-
17	Assistance available	-

18	Available marketing facility for the crop.	Direct Selling to Cadbury India Ltd, Salem.
19	Other infrastructure available in the vicinity.	
20	General upkeep of the plot; Very good/ Good / Average/ Poor.	
21	Any other relevant observation by the JIT.	

## Area Expansion – Cocoa (2009-2010)

The farmer has taken cocoa as intercrop of coconut and the field is under organic farming. The irrigation is through drip at his own cost. Red ant problem existed and the produce is marketed directly from field to M/s. Cadburry. The field condition is very good.

# FIELD VISIT NO :2

Sr.		
No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	Manickam S/o. Palani gounder Souppu Reddi kadu, Kidaiyur, Devanna goundanur Village, Sankagiri Block.
2	Total land available with the beneficiary (ha).	2.55.5 Ha
3	Crop Cluster under which covered.	Mango – 1.00 Ha
4	Name & variety of crop planted.	Mango - Bangalura
5	Source of planting material.	Govt.Horticulture Farm, Karumandurai.
6	Number of planting material.	Mango – 400 Nos

## Area Expansion – Mango High Density Planting

7	Number of plants planted/ rejuvenated.	400 Nos
8	Date of plants which survived (also indicate percentage survival).	
9	Total amount of subsidy assistance due to the beneficiary as (Rs.)	Rs. 29600/-
10	Amount paid and date of payment.	Rs. 8500 .00 + 2450. 00 = 10950 /-
11	Mode of payment.	Cheque - Rs. 8500 /- ( No: 730931 / 23.05.2011 ) ECS – Rs. 2450 /-
12	Source of Irrigation Water (Bore well/ Tube well/ Canel)	Bore well
13	Whether Drip/ Sprinkle System in use.	Drip System
14	Other inputs provided.	Inputs 2010-11 – Rs. 13700 /- Inputs 2011-12 – Rs. 4950 /-
15	Whether assistance available for Organic Farming	
16	If so, area covered	
17	Assistance available	
18	Available marketing facility for the crop.	Tenancy
19	Other infrastructure available in the vicinity.	
20	General upkeep of the plot; Very good/ Good / Average/ Poor.	
21	Any other relevant observation by the JIT.	

## Area Expansion – Mango High Density Planting (2010-2011)

The crop is 4 years old. In the initial stages there were mortality upto 15% which were replanted. Irrigated by emitter drip system laid by the farmer at his own cost. The field condition is good.

# Sankagiri Block.

Sr. No.	Details	Remarks
1	Name & address of beneficiary visited.	Ramasamy, S/o. Angamuthu Mattampatti, Devanna goundanur village, Sankagiri.
2	Total land available with the beneficiary (ha).	1.55 Ha
3	Type of MI system availed Drip/ Sprinkler	Drip Irrigation
4	Crop(s) covered	Vegetables – Brinjal, Onion, & Tapioca
5	Total area covered (ha)	0.80 Ha
6	Crop Spacing (for drip)	1.2 × 0.6M
7	Year of establishment	2012-13
8	Name of Manufacturer/ Supplier	John Deere India Pvt.Ltd, Coimbatore.
9	Total subsidy paid & date of payment	2012 – 13 - Rs. 43816 /- 2013 – 14 – Rs. 38110 /-
10	Mode of payment	ECS
11	Status of crop	Good
12	General upkeep (Very good/ Good/ Average/ Poor)	
13	Any other relevant observation by JIT.	

### Micro Irrigation – 2012- 2013 & 2013-2014

The drip system is laid out for brinjal, tapioca and onion supplied by M/s. John Deere India Pvt. Ltd. Coimbatore. The farmer faced drought earlier and with water saving of three times through drip, they were able to expand more area for cultivation. The filter is cleaned once in every 4 days and drip system is maintained well.

S.No	Details	Remarks
1	Name & Address of beneficiary visited.	Pappannan s/o Ramasamy reddy Makkal Reddiyur, Vellarivelli village
2	Total land available with beneficiary (ha)	1.72.5Ha
3	Type of ML System availed Drip/ Sprinker	Drip irrigation systems
4	Crop(s) coverd	Таріоса
5	Total area covered (ha)	1.00.0Ha
6	Crop Spacing (for drip)	1.2x0.6M
7	Year of establishment	2013-14
8	Name of manufacturer / supplier	Kothari Agri Tech Pvt Ltd, Coimbatore

## FIELD VISIT NO :4

9	Total subsidy paid & date of payment	Rs 92,452/-
10	Mode of Payment	ECS
11	Status of crop	Good
12	General upkeep (very googd/ Good/	
	Average/ Poor)	
40	Any other relevant observation by JIT.	
13		

### Micro Irrigation – 2013-2014

The drip system has been laid for tapioca by M/s. Kothari Agri Tech., Ltd., Coimbatore. The water is pumped from borewell of 1100 feet and to a tank. The cultivation has increased to 5 folds and as per the yield which was 5 to 6 tonnes earlier has also increased to 15-20 tonnes. With quality the rate of produce has also increased. The problem of clogging is removed through acid treatment.

### FIELD VISIT NO :5

### **Mechanization- Tractor Distribution**

SI. No	Details	Remarks
1	Name & address of Beneficiary whose field visited	K.Ramasamy S/o Kandamsamy Poomarathu Muniyappan Kovil ,Vellaravelli Village
2	Total land available with the beneficiary (ha)	3.36.0 Ha

3	Type of Protected Machine (Above 20 hp)	Tractor
4	Year of Establishment	2013-14
5	Unit	1 No
6	Total cost	RS 7,15,000/-
7	Agency involved in fabrication and installation	Sree Amman Farm Equipments Agencies , Salem- 5
8	Total subsidy paid and date of payment	Rs 1,50,000/- as back end subsidy
9	Crop being grown	Tapioca and Bhendi
10	Condition of Structure	Sustainable
11	Condition of Crop	Standing crop
12	Tie up with market	-
13	General upkeep (Very good/ Good/ Average/Poor)	
14	Any other relevant observation by JIT	

### Tractor - 2013-2014

The farmer had purchased a Massey Ferguson tractor with accessories cultivator and trailer. The use is upto 20 days per month and ploughing 10 acres of his land and also transportation of his produces and field inputs. Maintenance and after sale service is good.

# FIELD VISIT NO :6

SI. No	Details	Remarks
1	Name & address of Beneficiary whose field visited	M.Sundarasekaran S/o Mekkiappan Anaikattan Pudur, Chittoor Village
2	Total land available with the beneficiary (ha)	0.97.0 ha
3	Type of Protected Machine (Below 20 hp)	Power Tiller
4	Year of Establishment	2013-14
5	Unit	1 No
6	Total cost	RS 1,56,450/-
7	Agency involved in fabrication and installation	VST , Attur.
8	Total subsidy paid and date of payment	Rs 60,000/- /- as back end subsidy
9	Crop being grown	Tapioca and Bhendi
10	Condition of Structure	Sustainable
11	Condition of Crop	Standing crop
12	Tie up with market	-
13	General upkeep (Very good/ Good/ Average/Poor)	

## **Mechanization – Power Tiller Distribution**

## Power Tiller - 2013-2014

The power tiller is used for inter cultivation operations in tapioca and vegetable crops. Regularly used and maintained well. The farmer wanted to take the Power Tiller for rent if necessary.

## FIELD VISIT NO :7

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	A.Chellappan S/o.Athiappan Poolampatti, Edappadi
2	Total land available with the beneficiary (ha).	
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Shade Net House
4.	Year of establishment	2014-15
5.	Size of Structure (Sq. m)	500 sq.m
6.	Total cost	
7.	Agency involved in fabrication and installation	Arunai Agro Thiruvannamalai

## **Protected Cultivation – Shade Net**

8.	Total subsidy paid and date of payment.	
9.	Crop being grown	Arecanut Seedlings,
		Papaya seedlings
		Vegetable Seedlings like
		Tomato, Brinjal
10.	Condition of Structure	
11.	Condition of Crop	
12.	Tie up with market	
13.	General upkeep (Very good/ Good/ Average/ Poor)	
14	Any other relevant observation by JIT.	

# FIELD VISIT NO :8

# **Protected Cultivation**

Sr. No.	Details	Remarks
1	Name & address of Beneficiary whose field visited.	S.Rajkumaar, 233/1, Punjai Kadu, Poolavari, Veerapandi, Salem district, Tamil Nadu
2	Total land available with the beneficiary (ha).	1.6 ha
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Hi tech Poly house
4.	Year of establishment	2013-14

5.	Size of Structure (Sq. m)	4032 sq.m
6.	Total cost	Rs. 37,69,920/-
7.	Agency involved in fabrication and installation	A.S.F.Green House Co., 2, Ground floor, Opp. Govt. School, Behind police station, Hebbal, Bengaluru-24
8.	Total subsidy paid and date of payment.	18,70,000/-
9.	Crop being grown	Cucumber
10.	Condition of Structure	
11.	Condition of Crop	Vegetative
12.	Tie up with market	
13.	General upkeep (Very good/ Good/ Average/ Poor)	
14	Any other relevant observation by JIT.	

## Protected Cultiviton – 2013-2014

Polyhouse of about 4000 sqm. has been constructed with cucumber as the first crop with base material cocopeat. The crop is infected due to disease and non uniformity of drip. The firm M/s. Netafim is rectifying the defects. Plastic nets have been laid out for the plant to creep.

## FIELD VISIT NO :9

Area Expansion- Loose Flowers ( Rose)		
Block: Panamarathuppatti		
SI. No	Details	Remarks

		<b>T</b>
	Name & address of Beneficiary whose	Tamilarasan,
1	field visited	S/o.Thangavel,
		Kammalapatty,Panamarathupatty
	<b>—</b>	Block
2	Total land available with the beneficiary (ha)	2.70.0 Ha
3	Crop Cluster under which covered	Flower
4	Year of Establishment	2013 - 2014
5	Name & Variety of crop planted	Rose (Andhra Red)
6	Source of planting material	State Horticulture Farm, Sirumalai
7	Number of planting material	1200 Nos
8	Number of plants planted/ rejuvenated	1150 Nos
	Date of plants which survived	
9	(also indicate percentage survival)	1150 Nos 96 %
	Total amount of subsidy assistance due to	
	the	
10	beneficiary as (Rs)	Rs. 12000/-
11	Amount paid and date of payment	-
12	Mode of payment	
	Source of Irrigation Water	
13	(Bore well / Tube well/ Canel)	Borewell
14	Whether Drip/ Sprinkle System in use	Drip
15	Other inputs provided	-
	Whether assistance available for Organic	
16	Farming	-
17	If so, area covered	-
18	Assistance available	-
19	Available marketing facility for the crop	Flower Market
20	Other infrastructure available in the vicinity	-
	General upkeep of the plot;	
21	Very good/ Good/ Average /Poor	
22	Any other relevant observation by the JIT	

### Area Expansion – Loose Flowers (Rose) – 2013-2014

The field has been laid out with drip irrigation and the crop is 1 year old. Harvesting has been started after 6 months and the farmers have achieved good yield. The drip system which was laid out for tapioca in 2011-2012 has been used for the crop. Irrigation is given every alternate days for two hours. Marketing facility is good but the harvesting is done mainly in the mid night and hence request for light for plucking of the flowers.

# FIELD VISIT NO :10

SI. No	Details	Remarks
1	Name & address of Beneficiary whose field visited	Sugavana sivaprakasam S/o Sengoda gounder Kammalapatty Panamarathupatty Block, Salem
2	Total land available with the beneficiary (ha)	2.94.0 Ha
3	Type of Protected cultivation activity (Hi- tech / Normal GH, Shade net, Plastic tunnel)	Plastic Mulching
4	Year of Establishment	2011-12
5	Size of Structure (Sq.m)	1.00.0
6	Total cost	Rs 25000/-
7	Agency involved in fabrication and installation	Own
8	Total subsidy paid and date of payment	Rs.10000/- through ECS
9	Crop being grown	Tomato,Brinjal
10	Condition of Structure	Sustainable
11	Condition of Crop	Standing crop
12	Tie up with market	Dadagapatty Uzhavar sandai
13	General upkeep (Very good/ Good/ Average/Poor)	
14	Any other relevant observation by JIT	

### **Protected Cultivation**

## Protected Cultivation – Plastic mulching (2011-2012)

The field is with brinjal and tomato. Mulching with drip has been laid out for the crops. The farmers have found moisture conservation and higher root formation. Also intercrop of guava has been taken up.

#### FARMERS MEETING

A Farmers meeting was held and about 25 farmers participated in it. Farmers felt that only because of the initiatives taken by the officials of the Department of Horticulture they are still continuing with the farming. Farmers felt that over the past decade the rainfall has reduced with drought once in every 3 years. With the benefits through area expansion programmes, protected cultivation through micro irrigation and mulching the farmers are not only able to survive the difficult situation but also increase the productivity. The farmers had requested for cold storage and marketing complex in their areas.

### SUGGESTIONS

- 1. Polyhouses may be constructed in places of vegetables and flower cultivation.
- 2. Mulching which has been carried out in farms for vegetables can be expanded to other crops also through the success stories.
- 3. Supply of red flesh guava lalith varieties can be supplied through gene bank.

# Salem District Photographs











